मयमतम्

Mayamatam

VOLUME I



INDIRA GANDHI NATIONAL CENTRE FOR THE ARTS

The *Mayamata* is a *Vāstuśāstra*, i.e. a treatise on dwelling, and as such it deals with all the facets of gods' and men's dwellings, from the choice of the site to the iconography of the temple walls. It contains numerous and precise descriptions of villages and towns as well as of the temples, houses, mansions and palaces. It gives indications for the selection of a proper orientation, right dimensions, and of appropriate materials. It intends to be a manual for the architect and a guidebook for the layman. Well-thought-of by traditional architects (*sthapati*-s) of South India, the treatise is of great interest at a time when technical traditions, in all fields, are being scrutinized for their possible modern application.

The present bilingual edition prepared by Dr. Bruno Dagens, contains critically edited Sanskrit text which is an improvement over the earlier edition by the same scholar and published as No. 40 of *Publications de l'Institut Français d'Indologie*, Pondicherry. The English translation, also published earlier, has now been revised with copious notes. The usefulness of the edition has been further enhanced by adding an analytical table of contents and a comprehensive glossary.



मयमतम्

MAYAMATAM

कलामूलशास्त्र-ग्रन्थमाला-१४

KALĀMŪLAŚĀSTRA SERIES-14

GENERAL EDITOR
KAPILA VATSYAYAN



INDIRA GANDHI NATIONAL CENTRE FOR THE ARTS
NEW DELHI
AND
MOTILAL BANARSIDASS PUBLISHERS PVT. LTD
DELHI

मयमतम्

MAYAMATAM

TREATISE OF HOUSING, ARCHITECTURE AND ICONOGRAPHY

SANSKRIT TEXT EDITED AND TRANSLATED
BY
BRUNO DAGENS

Volume I



INDIRA GANDHI NATIONAL CENTRE FOR THE ARTS
NEW DELHI
and
MOTILAL BANARSIDASS PUBLISHERS PVT. LTD.
DELHI

Reprint: 1997, 2000, 2007
First Published: 1994

Published by
INDIRA GANDHI NATIONAL CENTRE FOR THE ARTS
Central Vista, Janpath, New Delhi-110 001

in association with
MOTILAL BANARSIDASS PUBLISHERS PRIVATE LIMITED
Bungalow Road, Jawahar Nagar, Delhi-110 007

ISBN: 978-81-208-1226-0 (Set)
978-81-208-1224-6 (Vol. I)
Price: Rs. 2500 (Set)

Printed in India
at Shri Jainendra Press
A-45, Naraina Industrial Area, Phase-I
New Delhi-110 028

TO

PANDIT N.R. BHATT
MASTER AND FRIEND

FOREWORD

In the series of *Kalāmūlaśāstra* early texts on music, namely, *Mātrālakṣaṇam, Dattilam* and *Bṛhaddeśī,* have been published. The medieval texts on music, specially, the *Śrībastamuktāvalī* (No.3 in the series)and the *Nartananirṇaya* (No. 17 in the series), bring us upto the 15th and 16th century. In the case of architecture, despite the IGNCA's endeavour to publish portions of the *Bṛhatsaṃhitā,* the *Agnipurāṇa* and the *Viṣṇudharmottara-purāṇa,* first this has not been possible. Instead, our scholars were able to complete work first on a late but important text, namely, *Śilparatnakośa.* We hope that the sections on architecture in the *Bṛhatsaṃhitā,* the *Agnipurāṇa* and the *Viṣṇu-dharmottara-purāṇa* which predate the medieval texts, will be published soon, alongwith revised and re-edited texts of *Mānasollāsa* and *Aparājitapṛcchā.*

The *Mayamatam* is the fourteenth and fifteenth volumes in the *Kalāmūlaśāstra* series of the Indira Gandhi National Centre for the Arts (IGNCA).

Urban development and city planning was, undoubtedly, known to the Mohenjodaro, but its most outstanding survivals of the historical period are in South India. The layout of Tanjore and, later, Madurai, has been widely commented upon. Understandably, technical texts which devote attention to village, city planning, house building and temple construction, should be expected. An outstanding example of a comprehensive text, comprising thirty-six chapters, is the *Mayamatam,* written sometime between 11th and 12th century. The text is, obviously, a deduction from existing practices and actual structures rather than an abstract theoretical treatise on architecture. Its contents are more systematic than those found in other comprehensive texts, such as, the *Mānasollāsa* or the *Samarāṅganasūtradhāra.* The latter two are encyclopaedic in nature but are not tightly structured. In contrast, *Mayamatam* is more definitive and coherent as it situates itself within the larger Śaiva tradition and even more particularly, the *Śaivāgama* tradition and takes into account actual town and village layouts and temple construction. While it would be debatable whether the text precedes or succeeds the construction of the Bṛhadīśvara Temple, the text gives ample evidence of the author's full acquaintance with architectural plans, techniques of construction and the modular approach in regard to the number of storeys. The text assumes

importance not only for its detailed descriptions of temples, but also for its detailed descriptions of houses for different categories of inhabitants in a village and a city, entrances, exits, ventilations and much else. Equally revealing is the concern with examination of the site, the analysis of the soil, the preparation of the foundations, the materials to be used and the methods of construction. A comparative study of the valuable data in this text, with techniques which survive with the traditional *sthapatis* and others, would be the next rewarding journey.

As We have observed elsewhere *Vāstu* and the *Agama* traditions are complementary and often they overlap. This was evident in the *Svāyambhuvasūtrasaṃgraha* and this interdependence has been highlighted by Prof. Pierre Filliozat in his Introduction. The *Mayamatam,* likewise, complements material in the *Kāmikāgama* specially the section on the *Pūrvakāmikāgama* and the two should be seen together, because while the text on architecture details the techniques of construction, the *Āgama* texts lay down the process by which the material is transubstantiated to a non-material plane.

The text of the *Mayamatam* also interlinks the IGNCA programmes of studying the area of Tanjore and the Bṛhadīśvara Temple. In a related programme, precise measurements have been taken of the city, new layout plans have been made, the Temple has been measured precisely and a new set of drawings of ground plans, elevation and sections, is ready. Alongside, a volume on sculpture of the Temple, not understood in isolation but in its aspect of a programmed orchestration of the outer and the inner, the lower and the higher is ready for publication. Inscriptions have been re-assessed from the point of view of their placement and the contents of these inscriptions, specially those that have been deciphered recently, throw a fund of information on the organisation of temple architecture activity. Alongside, the temple rituals are being documented. Studies are being carried out in regard to adherence or departures in contemporary practice of these rituals from the *Āgamas* — whether the *Kāmikāgama* or the *Makuṭāgama*. A comparison of the material of *Mayamatam* and the studies in the Bṛhadīśvara project will, undoubtedly, throw up a new set of issues for further study.

With the publication of a group of monographs relating to the Bṛhadīśvara Temple, including the *Īśānaśivagurudevapaddhati* and the *Makuṭāgama,* the architectural, sculptural, painting and epigraphical volumes, and the volume based on the socio-political and cultural aspects and the history of the period and region, and now the *Mayamatam* the Institution will have, hopefully, provided a new or, certainly, an alternate model for the study of cultural areas

and regions. Here theory and practice — the textual and the oral, the historical and contemporary, the monument, the texts and the living traditions are being investigated as interpenetrative categories.

Indira Gandhi National Centre for the Arts is grateful to Dr Bruno Dagens, Editor and Translator of this edition of the text. A French edition was published by the French Institute of Indology, Pondicherry, in 1970-76 and an English translation of the text from Sitaram Bharatia Institute of Scientific Research was published in 1985. The present edition is a revision of Dr Bruno Dagen's critical text published as also a revision of the English translation. He has provided an insightful introduction and an exhaustive glossary of technical terms which will be an invaluable source of understanding for future scholars. Dr Bruno Dagens brings to this edition the sensitive understanding of an excavator and an archaeologist. Thus, many complex passages have been edited by him with a view not only of grammatical correctness but also from the point of view of comprehension as statements of architectural construction. The question of homogeneity of this text — whether it was all composed during Cola or the post-Cola period is somewhat debatable. Dr Bruno Dagens concedes that there may be some interpolations. However, the question of interpolations in the Indian textual tradition is itself a complex matter. The text was never considered to be a frozen text. Since at all times the text reflected actual practices, as and when actual practices went through modifications, these changes were reflected in the subsequent texts or incorporated into an already prevalent text. Elsewhere, we have taken up the question "What constitutes the authenticity of a text in the Indian tradition, other than the Vedic text under the category of *Śruti*?". The *Mayamatam*, like many other texts in different disciplines but particularly the arts, is also not a frozen text of a particular fixed date and time, but belongs much more to the stream of evolution and development of distinctive schools of architectural style.

I would like to take this occasion to thank Dr Bruno Dagens for preparing the present text and thank my colleagues, specially Dr N.D. Sharma who has assisted in proof-reading of the Sanskrit documents and publications, and Prof. Satkari Mukhopadhyaya, for supervision.

November 12, 1994 KAPILA VATSYAYAN

PREFACE

This is our third MAYAMATA and it owes a lot to the former ones. From the first published in 1970-1976 by the French Institute of Indology (now French Institute of Pondicherry)[1] we have retained without any substantial change the Sanskrit text and, after revision and emendation, the material for many of the footnotes which have been added to the translation. That last, as well as the Introduction, has been borrowed after revision from our second work published in 1985 by the Sitaram Bhartia Institute of Scientific Research;[2] we have tried to clarify it on several points, without however being able to make more than little progress in the interpretation of the passages dealing with timber work (chapters 18 and 25). The drawings of that second edition too have been kept with slight corrections; it should be reminded that they are meant to be no more than tentative sketches. Lastly an Index-glossary and an Analytical table of contents have been prepared.

The helps received since 1964 when the late Professor Jean Filliozat introduced us for the first time to the MAYAMATA, have been too numerous to be acknowledged one by one; exception is to be made however for that brought by Pandit N.R. Bhatt, founder and former Head of the Sanskrit Department at the French Institute of Pondicherry; I owe him more than can be expressed.

Lastly we thank Mrs. Kapila Vatsyayana for having asked us some years ago to prepare that book for the I.G.N.C.A. Series, and for having friendly stood for our endless delays.

Paris — Strasbourg, April 1992 **BRUNO DAGENS**

---

1. *Mayamata — traité sanskrit d'architecture*, édition critique, traduction et notes, 2 vols. Pondichéry 1970-1976 (Publications de l'Institut Français d'Indologie No. 40-I and II).

2. *Mayamata — an Indian treatise on housing architecture and iconography*, translation, New Delhi, Sitaram Bhartia Institute of Scientific Research, 1985 (the English text was at that time prepared with the kind help of M.P. Boseman).

CONTENTS

Vol. I

Vol. II

TABLE OF FIGURES

ANALYTICAL TABLE OF CONTENTS*

*Numbers in the parenthesis denote verses of the text.

INTRODUCTION

THE TECHNICAL LITERATURE AND THE *MAYAMATA*

The body of Sanskrit literature dealing with architecture and iconography is voluminous, even if scattered and insufficiently surveyed[1] and it is matched by a vernacular literature, more scattered and less known. It comprises, first of all, independent works which can be classified under the general heading of "technical treatises" (*śilpaśāstra*) or under the more precise one of "treatises on dwelling" (*vastuśāstra*) or "treatises on dwellings" (*vāstuśāstra.*)[2] The scope of these works, and that of the domain they cover, varies considerably and that goes for the comprehensive treatises as much as for those which confine themselves to limited subjects, such as iconography or astrological points bearing upon the founding and the construction of a house. There are few specialized works of importance in this category even so, architecture and iconography being more often dealt with in various works, whether more or less ambitious encyclopaedias or treatises which concentrate upon areas where architecture and iconography are involved. Some of the main *purāṇa* or *upapuraṇa* are to be found in this category (e.g. *Matsyapurāṇa*, *Agnipurāṇa*, *Viṣṇudharmottarapurāṇa* . . .) along with encyclopaedias of royal inspiration (e.g. *Mānasollāsa* of Someśvara, *Samarāṅgaṇasūtradhāra* of Bhoja . . .) and the Śaivite and Vaiṣṇavite *āgama* of various persuasions,[3] as well as the *Gṛhyasūtra*,[4] the *Arthaśāstra* and the *Bṛhatsaṃhitā*.[5] These types of works are just those in which the material is most abundant but most scattered; it should

1. For a very incomplete survey see Haridas Mitra's book (*Contribution to a Bibliography of Indian Art and Aesthetics*, Santiniketan 1951 [rep. 1980]).
2. On *vastu* vs. *vāstu* see below. The *Mānasāra* and the *Mayamata* whose contents are identical, are designated in colophons as a *vāstuśāstra* and as a *vastuśāstra*, respectively, which shows that these designations do not make for any reliable indication as to the contents or the originality of the works they are applied to.
3. On Śaiva texts see e.g. Dagens 1984; about Vaiṣṇava texts, besides older works of N.V. Mallaya (on *Tantrasamuccaya*: Mallaya 1949), H. Daniel Smith (*Pāñcarātra-prāsādaprasādhanam*: chapters 1-10 of the *kriyāpāda*, *Pādmasaṃhitā*, Madras 1963; *A Sourcebook on Vaiṣṇava Iconography According to Pāñcarātrāgama Texts*, Madras 1969) or T. Goudriaan on *Kāśyapajñānakāṇḍa* (Goudriaan 1965), see the book of G. Colas on architecture in the *Marīcisaṃhitā* (Colas 1986).
4. Cf. L. Renou, 'La maison védique', *Journal Asiatique*, vol. 231 (1939), pp. 481-504.
5. See A.M. Shastri, *India as Seen in the Bṛhatsaṃhitā of Varāhamihira*, Delhi 1969. To all these categories, one may add what we may call *belles-lettres*, as was shown by V.S. Agrawala's article on "Palace Architecture in Bāṇa's *Harṣacarita*: *skandhāvāra*, *rājakula*, *dhavalagṛha*' (*Mélanges d'Indianisme à la mémoire de Louis Renou*, Paris 1968 pp. 7-22).

be added that a number of small independent treatises are nothing more than extracts from much larger works and, as well, that it is hard to be sure whether the *Pūrvakāmikāgama* has borrowed from the *Mayamata* the very great number of passages common to both texts or whether the reverse is the case (see below).

That the dispersion is also historical and geographical only complicates the problem still further: the architecture and iconography, as they appear in a given work, are but the reflection of what was in existence during the time of its drafting in the region where that was done; significant in relation to the described forms, this factor is also apparent in the technical vocabulary which is always more or less marked by regional usage, as well as by borrowings from the vernacular. Then, there is the sectarian bias, whether stressed or not and very apparent in the iconography and also, even if to a lesser degree, in complex architectural forms, if not in their elements envisaged separately.[6] The pretension to universality of many of these texts does nothing to conceal this phenomenon, and whether the regional and sectorian features are more or less emphasized, they are still, usually, obvious. It must also be added that the Indian or, more precisely, the Hindu *koiné*, is so much the fruit of such a mixture of regional and unitarian trends that each author, or school, may legitimately imagine that its day-to-day reality is nothing but an accurate reflection of the whole Indian world.

In that very extensive and widely disseminated range of works, the *Mayamata* occupies a fairly well defined place. It is a general treatise, a *vastuśāstra*, written in Sanskrit but originating from Dravidian India, most probably from the Tamil area; it is part of the Śaivite āgamic literature without the connection being underlined by any pronounced sectarianism and its drafting must have been done during the Cola period, at the time when the architecture it describes had reached the peak of its maturity. Comprising about 3300 verses and divided into 36 chapters, it is identified as a *vastuśāstra*, that is, as a treatise on dwelling, for it defines the *vastu* as "anywhere where immortals or mortals live" (2.1). This definition is followed by specifications which show that the concept of housing is very wide and is divided into four categories: the Earth (considered as original dwelling), buildings, vehicles and seats (which last three are nothing but "*vāstu*" deriving from the first "*vastu*", the Earth). Once iconography has been added to this list we have a panorama, brief but inclusive, of the content of the work. Leaving aside here the details of this content which we will analyse

6. Such is the case of the Vaiṣṇavite temples comprising three sanctums placed each above the other (e.g. Vaikuṇṭhaperumāl temple at Kāñcīpuram or Sundaravaradaperumāl temple at Uttaramerūr); the *Mayamata* mentions them in a cursory way (9.69-70), while their precise description is to be found in the Vaiṣṇavite *Marīcisaṃhitā* (Colas 1986 pp. 57 sq).

further on, we note that the *Mayamata* is arranged in three large sections: the first (Chapters 1-10) deals with dwelling sites, the first *vastu*, the second section with buildings (Chapters 11-30) and the third (Chapters 31-36), with the last two *vastu*, vehicles and seats, and with iconography (Liṅga images and their pedestals). In these different sections are found entire chapters or significant passages consecrated to particular topics in the sphere of technique or that of the ritual which sets the pace for the construction: system of measurements and quality of the architects (Chapter 5), orientation and laying-out (Chapters 6-7), offerings to the gods of the site (Chapter 8), foundation deposit (Chapter 12), joinery (Chapter 17), rites for the end of the construction of a temple and for the first entry into a house (Chapters 18 and 28) and renovation work and associated rites (Chapter 35).

The work as a whole is coherent in spite of various interpolations which are sometimes, but not always, indicated by changes in the metres.[7] These appear quite frequently in chapters describing temples where they often give information on details of decorative motifs which were evidently mentioned, though not described, in the original text; in the same way the description of a pavilion of the *siddha* type (25.39 sq.) is interrupted by fourteen verses given over to ritual firepits (*kuṇḍa*); this interpolation would seem to have been entailed by the mention of the fact that the *siddha* pavilion may serve "for all rituals"; sometimes definitions of terms have been added, such as in Chapter 26 where we are given, but quite untimely, precise meanings for *vimāna*, *harmya* and *mālikā* (26.100).[8] These interpolations do not seem to give rise to any great internal discrepancy; it is only to be noted that the mention, in a general chapter on temples, of thirteen, fourteen and sixteen storeyed temple (11.19) seems to be the result of an updating of the text which never otherwise describes temples with more than twelve storeys (22.66 sq., see below).[9]

7. As a whole the *Mayamata* is written in classical *anuṣṭubh*, but in a systematic way, more elaborated metres (*vaṃśastham*, *triṣṭubh*, *śālinī*, *sragdharā*, *vasantatilakā*, etc.)are used for the envoi placed at the end of almost all chapters. Thus being the case, it appears that in some chapters numerous metres are mixed (e.g. ten and eleven different metres are found in Chapters 9 and 25 respectively), with amongst them few (Chapter 9) or even none *anuṣṭubh* (Chapter 10 where six different metres are used) and without such chapters looking more muddled than others more regularly versified.
8. See the analytical table of contents (above) for other examples of interpolation interrupting developments on specific topics.
9. In the same way we may note that some types of specific elements are sometime mentioned in building descriptions without having been defined previously: e.g. the *cārubandha* base which may be used for storeyed galleries (23.68), is not among those described in Chapter 14 (while being so in cognate texts, see *Īśanaśiva* kriyā 31.8-9).

That the *Mayamata* belongs to Śaivasiddhānta literature is demonstrated by the leading place given to Śiva temples, by the chapter given over to the *Linga* and especially by the speculations on the nature of the Linga which it contains and, lastly, by the pantheon described in Chapter 36 which is essentially that found in *śaivāgamas.*[10] This being said, the *Mayamata* nevertheless does not appear to be a sectarian work; the list of Śiva's Attendants is followed by a list of those of Viṣṇu (Chapter 23) and Chapter 36 includes descriptions of images of Buddha and Jina which are not usual in āgamic literature, no more than are mentions of the temples of these two deities such as are found here in the chapters dealing with villages and foundation deposits (9.70 sq. and 12.59 sq.). Ram Raz, who has noted the tolerance shown in the *Mayamata* (and the *Mānasāra*) towards Buddhists and Jains, says however that the locations attributed to the cult places of these two sects were close to those suitable for inferior deities or for malignant spirits.[11] This absence of sectarianism is marked in a much more general way by constant references to a very classical society such as is presented in the *Dharmaśāstras.* The society for which are intended the construction prescribed by the *Mayamata* is that of the four *varṇas* and the "others", who are installed at a distance and who are responsible for polluting tasks such as refuse collection (e.g. 9.95-98). If the society of the *Mayamata* is that of the *Dharmaśāstras,* its political organization is that of the *Arthaśāstra;* there too the references to classical India are very evident, as well where they concern the hierarchies of towns and villages, as when they give the method of organizing the defence of a kingdom with forts, and the way in which the royal council chamber is to be arranged (cf. Chapters 9 and 10 and 29.191 sq.).

It may be said, quite definitively, that the aim of the *Mayamata* is to organize the integration of the external manifestations of *siddhānta* Śaivism in a context which could be qualified as "non-sectarian Hindu", so as to avoid the term "secular" which is not very appropriate when speaking of traditional India.

The South Indian origin of the text cannot be questioned. Aside from the fact that it is virtually inherent in the connection with Śaivasiddhānta, it is brought out still more by the existing evidence of the architecture described. This architecture follows the option characterized by false storeys, which proliferated in Pallava times and which came to its full flowering in the Cola period, since when it has been perpetuated right up until today. It had already period, as is shown by preangkorean temples in Khmer area.[12] To that may be

10. If the *Mayamata* refers sometimes vaguely to '*Tantras*', (most probably the *Saiгāgamas*, the only more precise references we may find are one to the *Svāyambby*, one of those *āgamas* (see 15.5) and the other to the '*Yāmalaa* [- *tantra*]', a *śākta* collection (cf. 36.34 āpropos of Mothers' cult)

11. *Essay on the Architecture of the Hindus* (1834), p. 9.

extended to Ellora under the Rāṣṭrakūṭa and to South East Asia around the same added that a number of details give evidence of a drafting made in Tamil areas,[13] while the description of roof timber work in Chapter 18 seems to rely on a Kerala tradition. The last point to be noted is that the palmleaf manuscripts of the *mayamata* are in Grantha (Tamil) script or in Telugu or Malayalam script.[14]

The chronological elements at our disposal are mostly subjective. An *ad quem terminus* is given by quotations from the *Mayamata* found in the commentary of the *Śāradātilaka* (a *śākta* text) written in 1484 by Rāghavabhaṭṭa (cf. comm. ad *Śāradātilaka* 3.21 and 3.53). Our text however must be earlier and may have been written between the definitive elaboration of the false storey option and the appearance of the very big temples of this type, as those of Tanjore or Gangaikondacolapuram at the beginning of the 11th century. This hypothesis gains weight from the previously noted mention of temples with more than twelve storeys, in what seems to be an interpolation for the sake of updating: the temple of Tanjore has fifteen storeys and it would therefore be "abnormal" in relation to a treatise which limits the number of storeys to twelve; a mention of Śiva temples with sixteen storeys brings this temple back to the norm however by almost attaining the ideal maximum. In the same way we notice that gateways, according to the *Mayamata*, are not to have more than seven storeys, a maximum which was not achieved till the 12th century with the gateways of the Cidambaram temple (and was widely outnumbered at Vijayanagar times). We may therefore establish a chronological bracket which goes from the early 9th century to the late 12th. We may point out, in passing, that the mention of Buddhist and Jain cult places also accords with a drafting in the Cola period, one marked by relative tolerance.[15]

A word remains to be said about the originality of the work. The *Mayamata* forms, as we have seen, a fairly coherent whole and would seem to have been composed all in one piece with some later interpolations and additions. It represents an architectural school well-known throughout South India and its treatment of architecture is not basically very different from that to be found in many other texts, especially in those connected in one way or another with the

12. For an extensive survey of preangkorean architecture, see H. Parmentier, *L'art Khmer primitif*, 2 vols, Paris 1927 (chronological data to be corrected with Boisselier 1966).
13. Cf. especially the use of the hybrid *kāyapāda* to designate the struts (16.16 sq. and note ad loc.), of *saruṣapa* to designate the mustard seed (in place of *sarṣapa* 28.3) or of *kampa* with the meaning of 'pillar' (15.2).
14. We do not know however the origin of the *Viśvakarmaśilpaśāstra* quoted by N. Vasu where we have found *verbatim* quotations of the *Mayamata* (below Chapter 36 note 78).
15. On Jainism and Buddhism in Cola period, see K.A. Nilakantha Sastri, *The Coḷas* (2nd ed., Madras 1955), pp. 655-57.

Śaivasiddhānta tradition. The relationship of these texts with the *mayamata* may be of diverse kinds and in some cases the *Mayamata* has clearly been used as an authority: in the *Īśānaśivagurudevapaddhati*, which quotes it extensively when dealing with architecture, and in the *Śilparatna*, whose author has borrowed heavily from it. We may even mention here a Sinhalese treatise which concentrates upon what is auspicious or inauspicious for a construction and which uses the *Mayamata* to support its own authority.[16] In other texts, however, the direction of the borrowing is less evident and this is especially true of two works which appear to be particularly akin to the *Mayamata*: the *Kāmikāgama* and the *Mānasāra*.

The *Kāmikāgama* is among the most famous of the *śaivāgamas*; its first part (*Pūrvakāmikāgama*), is devoted mainly to architecture and is literally crammed with verses, and sometimes even entire passages, which are to be found in the *Mayamata*. It is questionable whether one of these two texts has borrowed from the other or whether both have borrowed from a third work but it does not seem possible to determine this at the present stage since the editions of the *Pūrvakāmikāgama* in current existence are all at a precritical stage, at best, which does not allow for any assessment of the exact value of the text as we know it.[17] We have personally often been struck by the impression that the composition of the chapters on architecture in this book was often rather incoherent; this would perhaps be explained by the presence of verses and passages borrowed from a well established treatise, such as the *Mayamata*, for the sake of filling in gaps in an ill-preserved text or of adding to information deemed insufficient, or both.

The *Mānasāra* is a comprehensive treatise on architecture and iconography from the same category as the *Mayamata* but, in spite of the numerous parallels between the two works, it would seem that they belong to two slightly different branches of the South India school of architecture. They both have exactly the same overall plan however; even though the *Mānasāra* is longer (5400 verses) and has a larger number of chapters (70), these two characteristics would appear to be no more than the effect of a somewhat padded presentation and of a more precise distribution of topics into chapters. P.K. Acharya, the editor, translator and commentator of the *Mānasāra*, assigned an extremely early date to it (Gupta period) and considered it the unique source of all presentations of

16. Referred to by A.K. Coomaraswamy (*Mediaeval Simhalese Art*, 2nd., New York 1956, pp. 120 sq.), this treatise has been edited and translated in French by J. Liyanaratne (*Le Purāṇa Mayamataya—manuel astrologique singhalais de construction*, Paris 1976).

17. See *Kāmikāgamaḥ — pūrvabhāgaḥ* published by the South India Arcakas' Association (Madras 1975), and N.R. Bhatt 'Analyse du Pūrvakāmikāgama', *Bulletin di l'Ecole Française d'Extrême-Orient*, vol. 64 (1977), pp. 1-38.

architecture in *purāṇa* and *āgama* as well as in more specialized texts such as the *Bṛhatsaṃhitā* or the *Mayamata*.[18] One of his arguments was that the *Mānasāra* was the most "complete" of all the texts dealing with architecture, in the sense that all the specific types mentioned in other texts were to be found in it. The early date thus given to the *Mānasāra* has been called into question, notably by T. Bhattacharyya who has pointed out that the argument which we have just cited would rather tend to favour a late dating and to show that the *Mānasāra*, in the state in which we know it, is, at the most, a sort of "recension of recensions", which is to say, a late and protracted version drawn from a less "complete" original and from numerous other sources as well.[19] We tend to agree with this view and would be ready to accept the Ur-*Mānasāra*, if such existed, as a work analogous to, and more or less contemporaneous with, the *Mayamata* for, notwithstanding their differences, both works seem, generally speaking, to refer to an equivalent phase in the development of the school which they represent.

As far as the *Mayamata* is concerned, we may, without over-emphasizing the originality of its teachings, consider it to be a rare and fairly good example of a mediaeval technical text, well preserved in its original form and, as such, worthy to be used as a reference work.[20]

II

THE EARTH AND THE SITES

The first part of the work deals, as has been said, with the first *vastu*, the Earth, in describing the dwelling sites which fall into two categories: natural sites or, more exactly, "primary" sites and towns and villages such as may be established on primary sites and which are designated as "derived" or "secondary" sites. The former, designated by the same words as is the Earth (*bhū*, *bhūmi*, *avani* ...), are examined, and it is in terms of that examination that they are assessed as suitable or not for a construction or a secondary site; they represent what may be called the natural environment as opposed to towns and villages which are artificial environments, having to be prepared and then modelled according to norms presented in the two chapters on town planning which conclude this first part.

18. P.K. Acharya, *Indian Architecture according to Mānasāra-Śilpaśāstra* (Oxford 1934, reprint New Delhi 1981), pp. 160-98.
19. T. Bhattacharyya, *The Canons of Indian Art* (Calcutta 1963), pp. 183-95.
20. The comparison of the contents of the text and the summary given in the first chapter shows that the *Mayamata* we know is fairly complete, in spite of some evident gaps (e.g. between verses 52 and 53 of chapter 30, or between verses 118 and 119 of chapter 36).

The first.chapter defines the work as a "treatise on housing" intended for gods and for men, gives the name of its author, Maya, and lists its contents.

Chapter 2 begins with the already quoted definition of housing (everywhere where immortals and mortals live), and with an enumeration of its four categories: the Earth, buildings, vehicles and seats. The last three categories however are simply *vāstu*, or derivations from the first, for the Earth is the initial form of dwelling on which the others have appeared. This idea can be most clearly seen in the opposition established between a site chosen specifically for a particular category of inhabitant, that is a secondary type of site (*gauṇa*) and the Earth which is the basic site (*aṅgin*). We return to this question when the different categories of building, vehicle and seat, have been enumerated and it has been indicated that the Earth is first, because she was the first entity to exist and because she is the support of the others and the stabilizing factor of the universe itself. The end of the chapter contains a list of the characteristics appropriate to sites intended for each of teh four *varṇa*, to which further allusion is made in the chapter dealing with private houses (cf. 27.5, 46 sq.).

Sites

Chapters 3 and 4 concern the examination and the taking possession of a site intended for a house, a temple or a settlement. Chapter 3 first lists the favourable and unfavourable features which can be perceived from a superficial examination of the site. Chapter 4 sets out the rituals and empirical procedures which are necessary for taking possession of the site and for the verification of its favourable characteristics. The first rite is the ploughing following by a sowing to ascertain the site's fertility.[21] Next comes a consecration rite combined with a procedure for verifying the permeability of the soil, which should be sufficient but not excessive, and for showing if it is compact enough;[22] the topic of the nature of the ground will be taken again and on a different basis ("dry" *vs.* "moist" ground) when dealing with foundation works (14.1-4a).

Measurements

Chapter 5 deals with the system of measurements and with the technicians working on the building. The exposition of the system of measurements (5.1-13) is brief, it enumerates the "formless", (atom to barley seed), and absolute measures in current use (digit, span, various kinds of cubit, pole and rope) giving the specific usage of these latter ones. The only relative measure

21. This corresponds to the *aṅkurārpaṇa* (germination of shoots) which opens festivals and other ceremonies.
22. See Dagens 1984 pp. 30-31.

which is dealt with here is the *mātrāṅgula* or *dehalabdhāṅgula* ("digit calculated from the body"), used in the ritual and defined as the middle phalanx of the second finger of the officiant. The measurements of distance (*krośa*, *gavyūta*, *yojana*) are defined elsewhere in the work (9.1-2) together with those for areas (*kākaṇī*, *māṣa*, *vartanaka*, *vāṭikā*, 9.2-4), as well as the relative measures in common and current use: module (*daṇḍa*, 15.28-29), intercolumniation (*bhakti*, 25.14) utilized for the proportions of pavilions and halls and the digit used in iconography (23.110). Also dealt with elsewhere will be the *āyādi* method with which the auspicious nature of the chosen dimensions is verified (9.18-24, 26.206 sq., 32.24, 33.58 sq., 36.296-98).[23]

Technicians

Four types of technicians (*śilpin*, 5.13-25) work on a building. The first is the architect (*sthapati* but also *takṣaka*, see below): the eulogy given here enlarges upon his moral qualities and on his science and it is elsewhere that a more significant definition of his function is to be found (*sthapatiḥ sthāpayet sthiram*, 9.128); otherwise he is the master of the work who is responsible for the building until its inauguration (18.199 sq., 28.25 sq.); he is involved in the various rites which punctuate the construction (12.18 sq., 18.130 sq., Chapter 28 passim) as well as in the ceremony which accompanies the extraction of a stone (33.22 sq.); in his religious function he is under the orders of an officiant (*sthāpaka* or *ācārya*).[24] Lastly we note that the term *sthapati* seems equally capable of designating any other artisan (9.95). The *sūtragrahin* ("drawer of the thread") who is responsible for the operation of measuring and of laying-out is the son or the disciple of the architect; we may thus think of him as a foreman, destined to become an architect himself; it is he who is referred to (without his name being mentioned) when it is said that, in the case of the architect's death, it is his son or disciple who must bring the work to a satisfactory conclusion (18.160). About the *takṣaka* it is simply said that, as his name indicates, he cuts the stone, wood or brick according to the order of the *sūtragrahin*; as the text unfolds however it becomes evident that the name *takṣaka* may also designate the architect himself (28.10), which designation corresponds to the use of the word *taccan* in Tamil. Lastly the *vardhaki* "fitter" is both a mason (see also 14.30) and a carpenter; he seems to play an active part in the consecration ceremony (18.185). The architect's three assistants rarely appear in the ensuing chapters except in collective formulae such as: "the four

23. About *āyādi* see Dagens 1984 pp. 18-20.

24. In the *Mayamata*, the terms *ācārya* and *sthāpaka* seem to be applied to the same and one officiant, while in the *Marīcisaṃhitā* the *ācārya* is assisted by several *sthāpaka* (see Colas 1986, p. 68).

of whom the first is the architect" (referring to the distribution of honoraria, 9.130, 10.94; see also 12.22).

Orientation and laying-out

Chapter 6 deals with the laying-out procedures for buildings and settlements. The orientation of the site is made according to the classic method with a gnomon (*śaṅkhu* 6.1-11; fig. 1). On this point the text presents the *apacchāyā* (6.11b-13 and 27-28) which is said to be a factor that allows for the rectification of the rough indication furnished by the gnomon; in reality, as shown by Michio Yano, this development on *apacchāyā* (found in the same context in several texts) has nothing to do with the orientation but simply gives a method of expressing the variation of the length of the noon-shadows in a modified linear

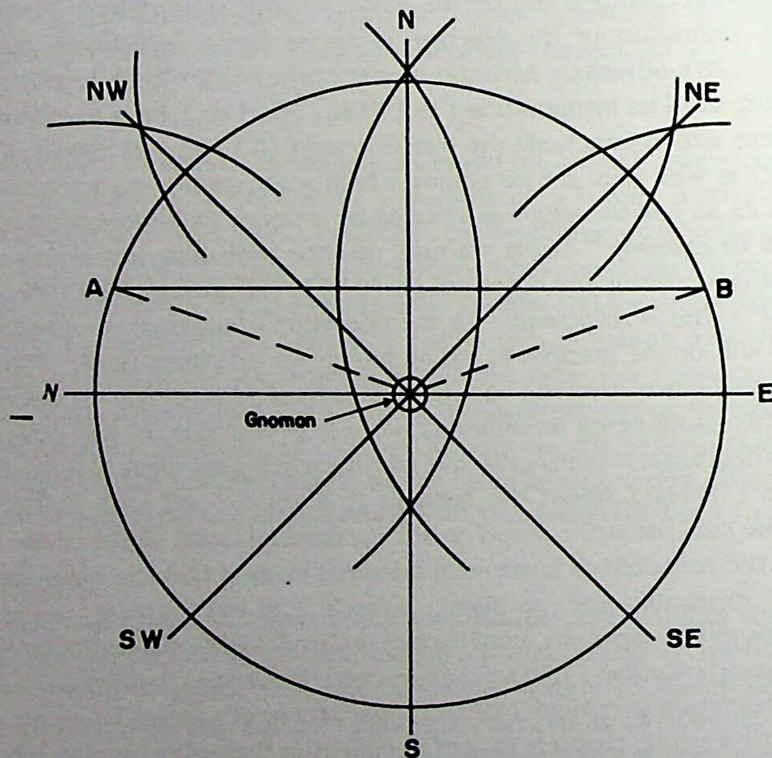


Fig. 1
Orientation (6.3b-11a)
(A, B: points where the shadow touches the circle
in the morning and evening respectively)

function, which method would seem to have its far off origin in Babylonia.[25] The unresolved question remains as to how and why this development has been systematically introduced in the orientation rules.

The layout proper uses stakes and rope (6.14-26); the indications given are not very clear but it would seem that a first line of reference which is called "*pramāṇasūtra*" (measuring line) and which marks the limits of the main body of the building, having been laid down, a second one (*paryantasūtra*, "line of limit") is drawn which marks the extreme limits of the delineated space. This second line is only mentioned once more in the text (under the name *sīmasūtra*), apropos houses (27.15); the first line, however, appears under various names (*ṛjusūtra, mānasūtra*), as that from which are determined the projections of elements which are going to be added to the main building as well as the recesses which correspond to the recessed parts of the facades (cf. 15.58-60, 21.223, 22.79-81).

These two lines are evidently used for both edifices and settlements since there are instructions for drawing them in either case (6.21-24). Verses 6.24-26 explain how the lines are drawn from the centre of the house thus allowing for the accurate laying-out of the principal main building of a house with four main buildings (*catuśśāla*) according to the category of its occupants (see as well 27.15 sq.).

Diagrams

The different parts of an assembly going to make up a complex edifice or a group of edifices or a settlement, are positioned with reference to a regular diagram drawn at the time of the laying-out. Each of the squares (*pada*) of the diagram is attributed to a protecting deity by whose name the square is designated. Chapter 7 lists thirty-two of these diagrams, from the single square diagram, to one with one thousand and twenty-two squares (32 × 32) and gives, in detail, the disposition of protective deities on some of them with particular emphasis on those with sixty-four (*maṇḍūka*) and eighty-one squares (*paramaśāyin*) as these are the most often used (7.32 sq., 57-58, figs. 2-6). All those diagrams may be used for rites as well as for building operations and this chapter gives the first example of such double use when it describes the body of the Spirit of the building (*vāstupuruṣa*) and indicate the vulnerable

25. M. Yano, 'Knowledge of Astronomy in Sanskrit Texts of Architecture (Orientation Methods in the *Īśānaśivagurudevapaddhati*)', *Indo-Iranian Journal*, vol. 29 (1986), pp. 17-29. See also, on a different point of view, J. Filliozat, 'Sur une série d'observations indiennes de gnomonique', *Bulletin de la section de géographie du Comité des travaux historiques et scientifiques*, Paris 1951, pp. 11-13 (reprinted in *Laghuprabandhāḥ*, Leiden 1974, pp. 271-73).

NORTH

Pavana	Veda	Udaka
Veda	Pṛthivī	Veda
Gagana	Veda	Dahana

Fig. 2
Pīṭha diagram (7.24)

points (*marma*) which are not to be touched during the construction (7.49-56; see also 9.86, 27.15-18). Chapter 8 gives details of the offerings to be made to the diagram's protective deities once that diagram has been laid out on the site.

Villages

Chapters 9 and 10 deal respectively with villages (*grāma*) and towns (*nagara*). If the settlements described in Chapter 10 have a largely urban function it would seem that the term *grāma* may be applied as well to villages as such, to sites of villages, and to settlements which may be towns as much as villages. This ambiguity is more marked in Chapter 9 which deals with villages in particular and with towns in general. This chapter begins (9.1-24) with an outline of the dimensions as those dimensions apply, first of all, to *grāma* and *nagara* and goes on to those of five types of settlement where *grāma* and *nagara* reappear, along with *kheṭa*, *kharvaṭa* and *durga* which are described in the following chapter. This exposition begins with indications as to the units for measuring distances and areas and ends with an explanation of the *āyādi* method (see above). Next, the question arises of how many brahmins are to inhabit a village (from 12000 to only one, 9.25-30) and then of the dimensions and names of a village's streets (9.35-39). Eight types of village are defined in terms of the number, of the orientation and of the layout of their streets (9.40-56; fig. 7). The account of the internal organization of villages successively

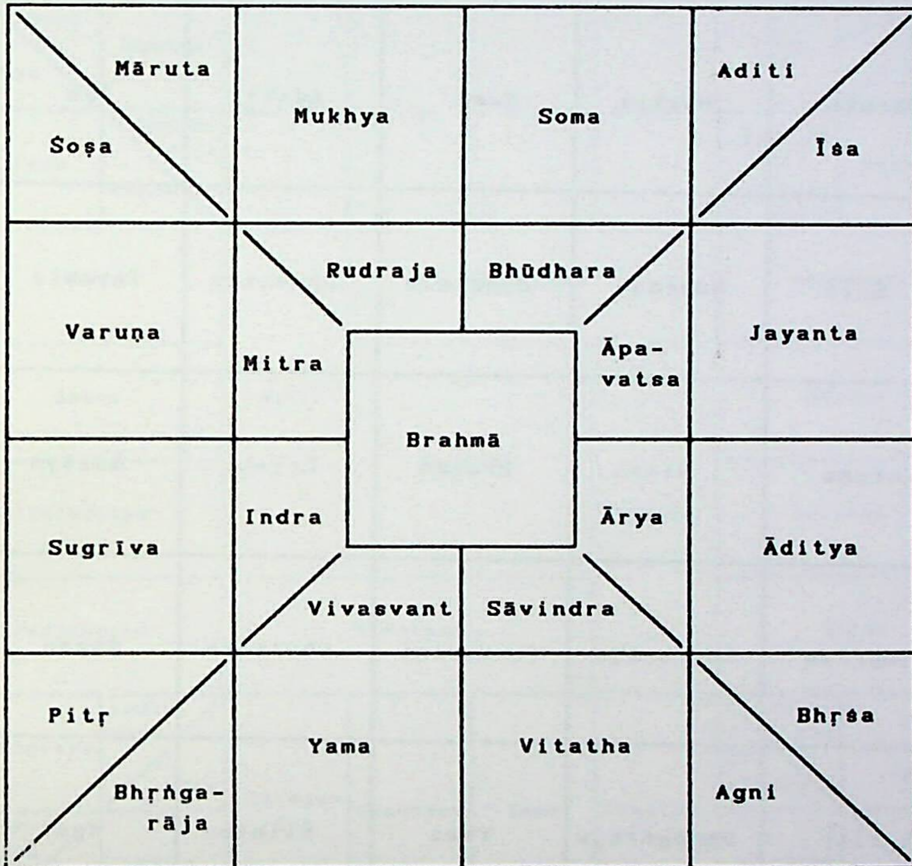


Fig. 3
Mahāpīṭha diagram (7.25-27)

presents the position of doors and of drains and the division of the village into concentric zones (determined on a diagram), each associated with a specific category of inhabitant; it goes on to the disposition of temples and their orientation, to the disposition of public facilities and to the artisans' quarters and then to what is to be set up outside the settlement: the dyers' quarter, the houses of *caṇḍāla* who are to collect the refuse every morning and, lastly, the cremation ground and cemetery. This outline ends with comments on the necessity of keeping to the prescribed plan (9.99-100) and with a note on the foundation deposits of settlements, a subject which recurs in Chapter 12 in connection with temples and houses : the shape of the casket and the composition and position of the foundation deposit for every type of settlement are given (9.101-128).

NORTH

Māruta	Mukhya	Soma	Aditi	Īśa
Śoṣa	Rudraja	Bhūdhara	Āpavatsa	Jayanta
Varuṇa	Mitra	Brahmā	Āryaka	Āditya
Sugrīva	Indrarāja	Vivasvant	Sāvindra	Bhṛśa
Pitṛ	Bhṛṅgarāja	Yama	Vitatha	Agni

Fig. 4
Upapīṭha diagram (7.28)

Towns

Chapter 10 too begins with an exposition of the dimensions of the different types of the towns that it later describes (10.1-12); the drawing of the enclosures is given next and then the dimensions of their walls, the diagrams in use and the width of the streets (10.13-18). The specific descriptions of towns (10.19-51) are more or less detailed and often no more than bare definitions. Successively presented are: *rājadhāni* (capital, see also 29.86), *kheṭa* (inhabited by *śūdra*), *kharvaṭa* (surrounded by mountains), *pattana* (trading port), *śibira* (fortified camp), *senāmukha* (town provided with a garrisoned

NORTH

Nāga / Vāyu, Mukhya, Bhallāṭa, Soma, Mṛga, Aditi, Diti, Īśa / Parjanya

Roga, Rudrarāja / Rudra, Āpa / Āpavatsa, Jayanta

Śoṣa, Bhūdhara, Mahendra

Asura, Mitra, Brahmā, Āryaka, Āditya

Jalādhipa, Satyaka

Puṣpadanta, Vivasvant, Bhṛśa

Sugrīva, Indrarāja / Indra, Bhṛṅgarāja, Gandharva, Yama, Rākṣasa, Savindra / Sāvindra, Antarikṣa

Dauvārika / Pitṛ, Mṛṣa, Vitatha, Agni / Pūṣan

Fig. 5
Maṇḍūka diagram (7.43-47b)

fort), *sthānīya* (royal foundation, see also 29.163), *droṇamukha* (commercial city on a river), *viḍamba* (near a village ?), *kotmakolaka* (in a forest), *nigama* (artisans' town), *skandhāvāra* (type of fort-town) and *durga* (fort), the description of this last being relatively detailed (and in many points very similar to that found in *Arthaśāstra* II.3): different types, necessary qualities, fortified doors and enclosures, inhabitants and gods (10.36-51). The towns as well as the villages may be defined by the number, orientation and plan of their streets, six types of these plans being mentioned (10.52-76). The chapter ends with an exposition of the situating of the various bazaars (*antarāpaṇa*) (see fig. 8) and residential quarters and points out that temples are disposed as in a village.

NORTH

Vāyu	Nāga	Mukhya	Bhallāṭa	Soma	Mṛga	Aditi	Uditi	Īśa
Roga	Rudrarāja		Bhūdhara			Āpa		Parjanya
Śoṣa	Rudra					Āpavatsa		Jayanta
Asura	Mitra		Brahmā			Āryaka		Mahendra
Jalādhipa								Āditya
Puṣpadanta								Satyaka
Sugrīva	Indrajaya		Vivasvant			Savindra		Bhṛśa
Dauvārika	Indra					Sāvindra		Antarikṣa
Pitṛ	Mṛṣa	Bhṛṅgarāja	Gandharva	Yama	Rākṣasa	Vitatha	Pūṣan	Agni

Fig. 6
Paramaśāyin diagram (7.33b-40, 58)

III
EDIFICES

The second and longest section deals with the architecture itself; it consists first of chapters given over to the precise analysis of the elevation, divided into levels. Next, successively described, are the temples with their enclosures and gateways, the pavilions and halls (which may be used for gods and men), then residential houses, and the palaces which complex assemblies are more relevant to town planning than to private houses.

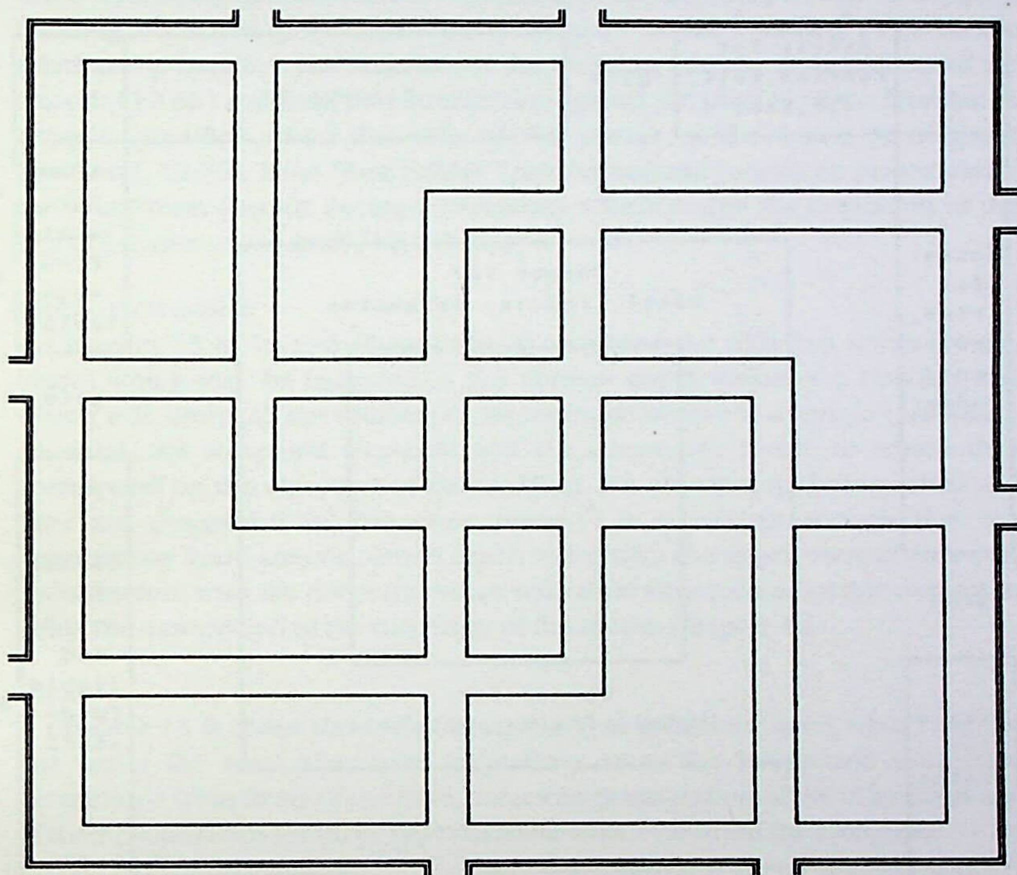


Fig. 7
Svastika village (9.43-45)

Chapter 11 looks at the dimensions and number of storeys in buildings, not otherwise defined, which would seem to be temples as much as dwellings, princely or otherwise. It has already been noted that Śiva temples with sixteen storeys are referred to here, even though the descriptions given in Chapters 19-22 on temples do not go above twelve storeys.

Foundation deposit

Chapter 12 deals with the foundation deposit (*garbha* lit. 'womb' or 'embryo'). This deposit which is essential to the success of the constructions is to be placed in a pit (12.3-5, see also 14.7); its principal element is a casket (*phelā*) with compartments, placed upon a bed of earths, roots and seeds (12.5 sq.) in the course of a ceremony counducted by the architect. Next, after a

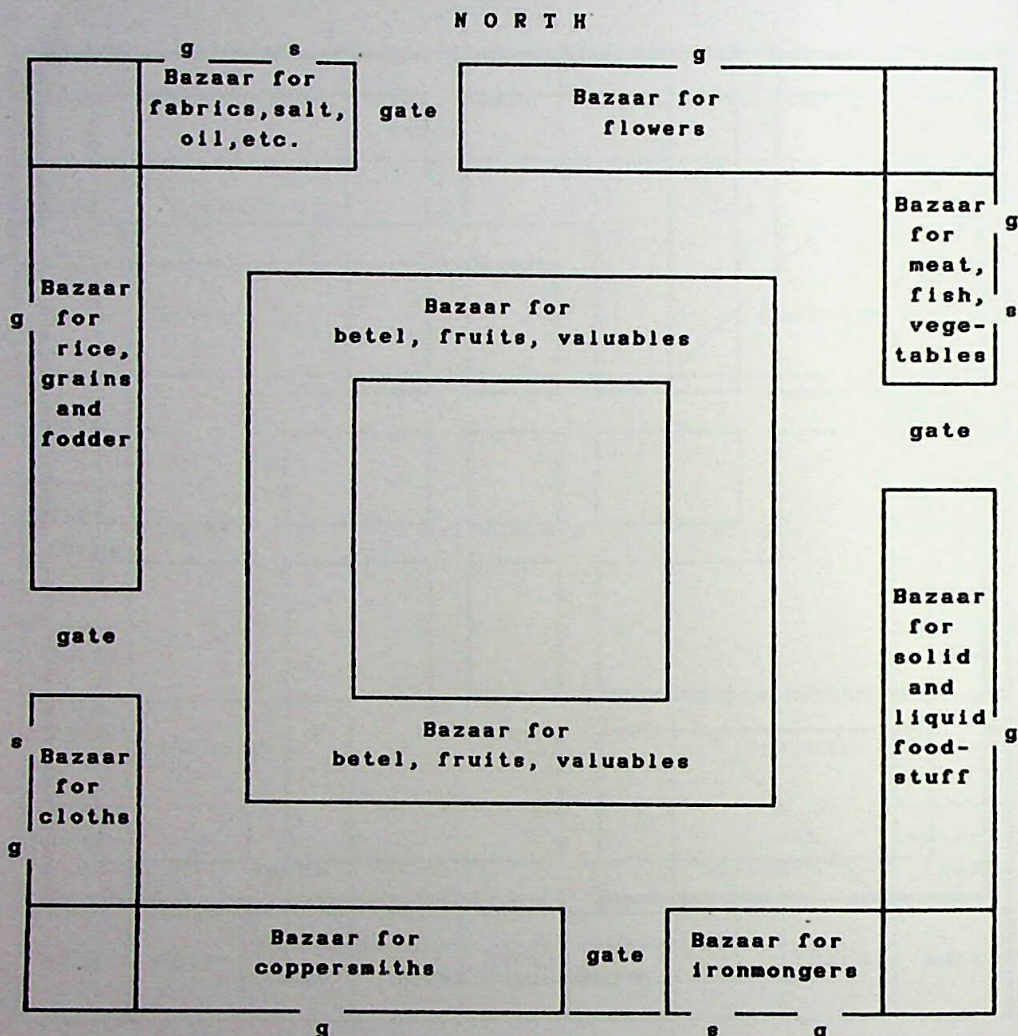


Fig. 8
Town layout (9.57 sq. and 10.80 sq.)
('g' = small gate; 's' = sewage outlet)

general view has been given (12.23-32), come the characteristics of the deposits appropriate to temples of the different deities (12.33-70): Śiva, Viṣṇu, Brahmā, Ṣaṇmukha, the Attendants of Śiva (including Sugata-Buddha and Jina) and the Goddesses. Then come deposits for the houses of the members of the different *varṇa*, those for the different types of building (*sabhā, maṇḍapa, raṅga*) and lastly, those for wells and hydraulic works (12.71-100). The descriptions are accompanied by details of the position of the deposit and by

some interesting general points: the mixing of the deposit peculiar to a type of building with that peculiar to the occupants of the building (12.83), the relationship between the function of the building and the composition of the deposit (12.88) and finally an interdiction against the placing of the foundation deposit (*garbha*) when the wife of the master of the house is pregnant (*garbhiṇī*, 12.95). Four "first bricks" (*prathameṣṭakā*) are to be placed above the foundation deposit during a ceremony which marks the beginning of the work of construction itself (12.101-14).

Levels of elevation

Chapters 13 to 16 and 18 describe in sequence the different levels (*varga*, *aṅga*) which may be included in the vertical composition of a building and which will, under all circumstances, be included in that of a temple (*prāsāda*). As usual, the structural elements and the decorative levels, to which they correspond on the elevation of the building, are not sharply distinguished and they are designated by the same terms;[26] it is evident though that the descriptions there are concerned much more with the appearance of elements and therefore with the decoration than with their structure, a notable exception being the description of the carpentry of the roof in Chapter 18.

Socle

Chapter 13 is about the socle (*upapīṭha*), an additional level which may be put under the base; after brief indications as to the height and projection determined from those of the base, comes an enumeration of the mouldings and of their proportions for three types of socle with a variation for each type.

Base

The base (*adhiṣṭhāna* . . . etc. cf. 14.40) is really the first level of the elevation, the socle being optional, which explains why Chapter 14, dedicated to it, starts with the method of preparing the ground before construction begins (14.1-10): it must first of all be determined whether the soil is dry (*jāṅgala*) or moist (*ānūpa*) even though both these categories are appropriate;[27] a solid foundation is then established through the digging of a pit, of the dimensions of the projected building, which is then filled with various materials and well tamped;[28] then the foundation deposit is installed; a regulating course (*janman*,

26. See Dagens 1984 pp. 50-51.
27. About *jāṅgala* and *ānūpa* see below Chapter 14 note 13 and, on a more general point of view, F. Zimmermann, *La jungle et le fumet des viandes* (Paris 1982) pp. 16-19 (English translation under the title *The Jungle and the Aroma of Meats*, Berkeley 1987).
28. The *Mayamata* does not insist on the foundation works proper, as does the *Marīcisaṃhitā* (see Colas 1986 p. 28).

upāna) is arranged on which the actual base is elevated. The height of the base is determined with regard to the number of the edifice's storeys or to the social class of its occupants (14.11-16, see also 14.47); rules are given to determine the projections and recesses of the various mouldings (14.17-18 and 41-44). The proportions of the mouldings of fourteen bases are listed (14.19-37); it is specified however that the proportions given may be slightly modified should need arise (14.39). The chapter ends with some notes on stereobates (*prati, vedikā*), that is to say moulded elements which may be interposed between two major levels (14.45-46; see also 16.51, 67).

Pillars

The first part of Chapter 15 (vv. 1-61) is given over to the level of the pillars[29] which rise up between the base and the entablature; this level corresponds to the habitable part of the building and its layout is made along *pramāṇasūtra* (or *ṛjusūtra*, cf. 15.57-58 and above about Chapter 6); in the case of a storeyed building it is repeated (along with its corresponding entablature) as often as there are upper storeys (see e.g. fig. 16). In spite of its name it may appear either as a colonnade or as a wall with pilasters or as a plain wall. This chapter, however, scarcely touches upon anything but the description of pillars or of pilasters, the distinction rarely being made (cf. however 15.51). Their dimensions are indicated (15.3-8, 116, 12.55-56), the diameter at the top being of importance since it serves as module (*daṇḍa*) for the whole building (15.28-29). Different types are then defined, either according to their position (15.9-11) or to the shape of their shaft (15.13-27). The crowning elements are the bell capital (*kumbha*), the abacus (*maṇḍi*) and the bracket capital (*potikā*) (15.29-50); but it is only the bracket capital which is indispensable (15.28a). The sole indication as to the composition of facades concerns the intercolumniation which, it is specified, must be regular.

Materials

The second part of Chapter 15 (vv. 62 sq.) deals with the materials used in construction, especially wood and brick; stones will appear in the chapter on the Liṅga (33.4-36). For wood there are lists of trees well adapted to the construction work (15.64-67, 108b-114; see also 25.182 sq.), followed by observations on their favourable and unfavourable characteristics (15.62-63, 71-76), by a description of the ritual which governs the search for, and the

29. The precise designation of the 'level of pillars' appears only once in the *Mayamata* (*jaṅghāvarga*, 14.10); elsewhere (and especially in descriptions given in Chapters 19 to 25) that level is designated by any of the numerous synonyms meaning simply 'pillar' and listed in 15.2.

cutting down of, a tree, and by indications as to the drying times for the wood (15.81-103). A list of the required characteristics of bricks is then given (15.68-70) and some details of their manufacture (15.115-120). Lastly, there are general indications as to the use of materials and the possibility of using one, two or three sorts of materials in a building which is accordingly called 'pure' (*suddha*), 'mixed' (*miśra*) or 'mingled' (*saṅkīrṇa*).

Entablature

Chapter 16 deals, for the most part, with the third level of elevation, the entablature (*prastara*, *mañca*) but information is also given on walls and on latticed windows. The height of the entablature is defined according to that of the base or that of the pillars (16.48); it is set on the top of the pillars with a mortar, the composition of which is given (16.41-42, see also 18.92 sq.). It comprises three main parts: first there is, at the bottom, the architrave (*uttara*) surmounted by a sort of fillet (*vājana*) which may be assimilated to an upper fascia (16.2-7); this fascia corresponds structurally to a wall plate which supports, whether directly or not, the beams of the plank floor which are at the level of the entablature (below); it is also surmounted by a decorative element, the *muṣṭibandhana*, made up of lotuses projecting like closed fists, hence its name; these lotuses may be cut directly into the ends of the beams or may be sculpted separately on a moulding which shapes the ends of the beams. Above this lower assembly is a second whose description is very confused and seems to correspond, in fact, to two slightly different systems. The main element of the first would be a sort of pent-roof or dripstone (*gopāna*) whose pronounced projection is held up by several different supports: braces (*pramālikā*) and/or struts (*kāyapāda*) as well as consoles (*daṇḍikā*) (16.7b-18a). The important element in the second system would be a cornice (*kapota*), rounded and projecting by much less which rests on the upper fascia of the architrave through the intermediary of an historiated frieze or other mouldings (16.18b-24a); the decoration of this cornice comprises false dormer windows (*nāsikā*) placed on its extrados just above a sort of band (*kṣudra*?) which outlines the edge of the cornice. The upper part of the entablature has, as its principal element, a frieze designated by various names (*prati*, *vedi*) which designate as well, in a more general way, the stereobates which make the connection between the various levels (see above) and, especially, that found below the attic (*gala*, *kaṇṭha*), that is to say, above the entablature, which duplication does nothing to clarify the description . . . This frieze is usually historiated but may also be plain; it is placed above a fillet and a groove, which separate it from the cornice and it is surmounted by a fillet (*vājana*) (16.28-35). The beams of the plank floor either rest directly upon the upper

element of the architrave (above) or through the intermediary of supports called *valīka*, which seem to be pieces perpendicular to the architrave. Above these beams (*tulā*) come, successively, the joists (*jayantī*), the small joists (*anumārga*) and, lastly, the flooring (or covering) of planks or masonry (16.36-45).

The various types of latticed windows (*jālaka*) are defined by the design of their opening and by the number and arrangement of their transoms and uprights (16.54-62). Lastly the walls which are dealt with at the end of the chapter are obviously light partitions (16.63-66).

Joinery

An examination of the assemblies (*sandhikarma*, Chapter 17) is inserted into the presentation of the levels of the elevation. After giving some information on the procedure (17.1-10) it begins by describing a series of assembled structures defined by the number of pieces of different dimensions which are, in turn, supports and themselves supported (17.15-28); the exact usage of these assemblies is not indicated and the impression is rendered, at least in one case, that the assembly described is not of carpentry work but is a house (17.24-26). On the other hand, there are the much more classical kinds of assemblies which involve vertical pieces such as pillars and horizontal ones such as architraves (16.31-37; figs. 9-10). These assemblies often call for pegs and tenons designated by various synonyms (17.44). The chapter ends with a lengthy exposition of mistakes in assembling and their consequences (17.45 sq.), but one may be surprised by the fact that none of the assemblies described here are mentioned, or even alluded to, in any other chapter of the treatise.

Attic, roof and finial

Chapter 18 is much longer than those preceding it and one section deals with the three upper levels of elevation (attic, roof, finial, vv. 1-115) and the rest with the ceremonies which mark the end of the construction of a temple (vv. 116-216).

What we call 'attic' is a small dwarf (false-)storey which is placed just below the roof. It is very much recessed, hence its traditional designation as 'neck' (*kaṇṭha*, *gala*, *grīvā*, etc.). A stereobate stands for a base and its entablature is constituted by the edge of the roof (18.2-7).

The description of the roof (*śikhara*, *śiras*, etc.) is rather muddled; in contrast to what is given for the other levels, it deals less with the external form of the roof than with that of its inner structure; more than that, what is described here is the structure of true timber roofs which, as far as temples are

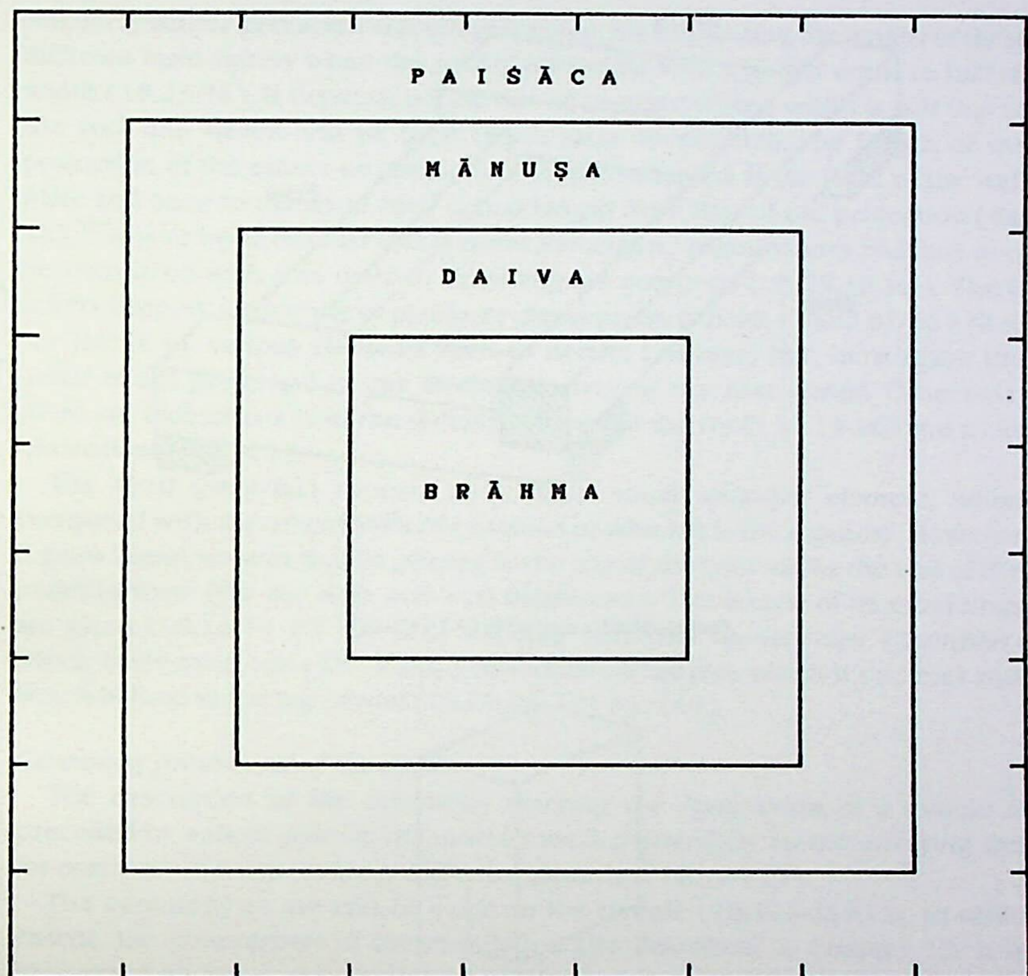


Fig. 9
Zoning of a paramaśāyin diagram according to *Mayamata* (9.61) and *Mānasāra* (9.170-174).

concerned, are found only in Kerala: elsewhere in South India the 'roof' taken as the fifth level of elevation is most often a massive masonry work.[30]

The principal pieces of the timberwork are the main rafters (*lupā*, but also *raśmi* cf. 25.203 sq.): they are of five types according to whether placed in median positions (*madhyalupā*), intermediate ones (*madhyakarṇa*, *akarṇa*, *anukoṭi*) or to whether they are corner rafters (*karṇalupā*, *koṭi*) (18.30-31). A

30. See below Chapter 18 note 7. Timber-roofs for *sabhā* (halls) are described in Chapter 25 (see below).

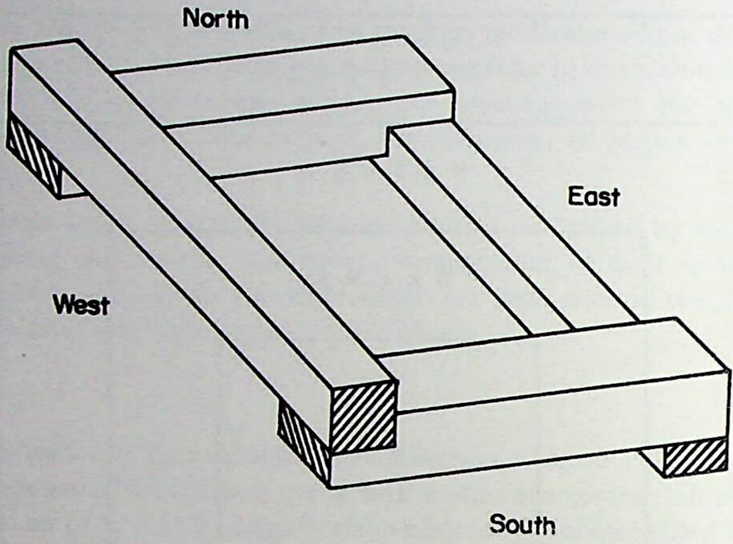


Fig. 10
Sarvatobhadra assembly (17.15b-18)

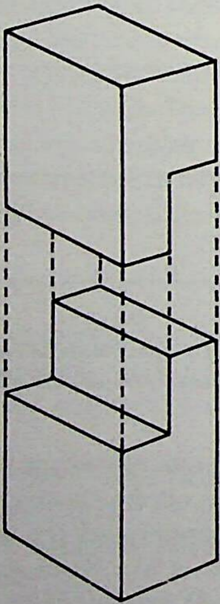


Fig. 11
Ardhapāṇi assembly (17.33)

relatively simple geometrical method is given, for calculating the length of these different main rafters when the roof is pyramidal with a height equal to half its width (18.23-36). It depends on the use of a square whose width is half that of the roof and which will be used twice: once to calculate the length of the projection of the rafters on the horizontal plan situated at the level of the wall plate and once to calculate their actual length from that of the projection (fig. 12).[31] It is to be noted that this method involves no trigonometry and thus may be compared with that used to draw regular polygons (cf. 25.49 sq.). These rafters support a covering of planks or metal plates (18.46-47 and 65-66); they are joined by various elements such as liernes (*valaya*) but, here again, the detail is not presented in any intelligible way as the text stands. Otherwise, there are indications as to the different shapes of the roof (18.15-16) and to its dimensions (18.7-12).

The finial (*stūpikā*) appears as a rather small moulded element, when compared with the other levels of elevation of which it is the topmost. However it gains importance in that its placing at the top of the roof marks the end of the building work (for the rites involved see below). The details of its mouldings are given (18.18-19, 83-90) with a special emphasis on the 'vase' (*kumbha*) which is the main one (18.193 sq.), as well as on the axis which it encloses and which is fixed to the top of roof (18.66 sq., 121 sq., 164).

Ceremony for the end of the work

The description of the ceremony marking the completion of a temple is preceded by a short note on the mortars used, particularly for the covering and for coatings where there are going to be paintings (18.92-115).

The ceremony at the end of work on the temple (18.116-216) is, to some extent, the counterpart of the foundation rite described in Chapter 12. It is performed on the occasion of the putting in place of the finial above the four 'crowning bricks', (*mūrdhneṣṭakā*) which correspond to the four first bricks and which cover a sacred deposit, which itself corresponds to the foundation deposit. These operations accompany the completion of a temple and the opening of the eyes of the images found therein; one of the officiants is the architect who withdraws once the finial has been put in place (18.199 sq.).

Temples

Chapters 19-22 describe temples with up to twelve 'storeys' (*tala*, *bhū*, *bhūmi*) and which have all the six levels of elevation described in the

31. See J. Dumarçay, 'Les charpentes rayonnantes sur plan barlong ou carré de l'Asie méridionale', *Bulletin de l'Ecole Française d'Extrême-Orient*, vol. 60 (1973), pp. 85-104 and especially fig. 6.

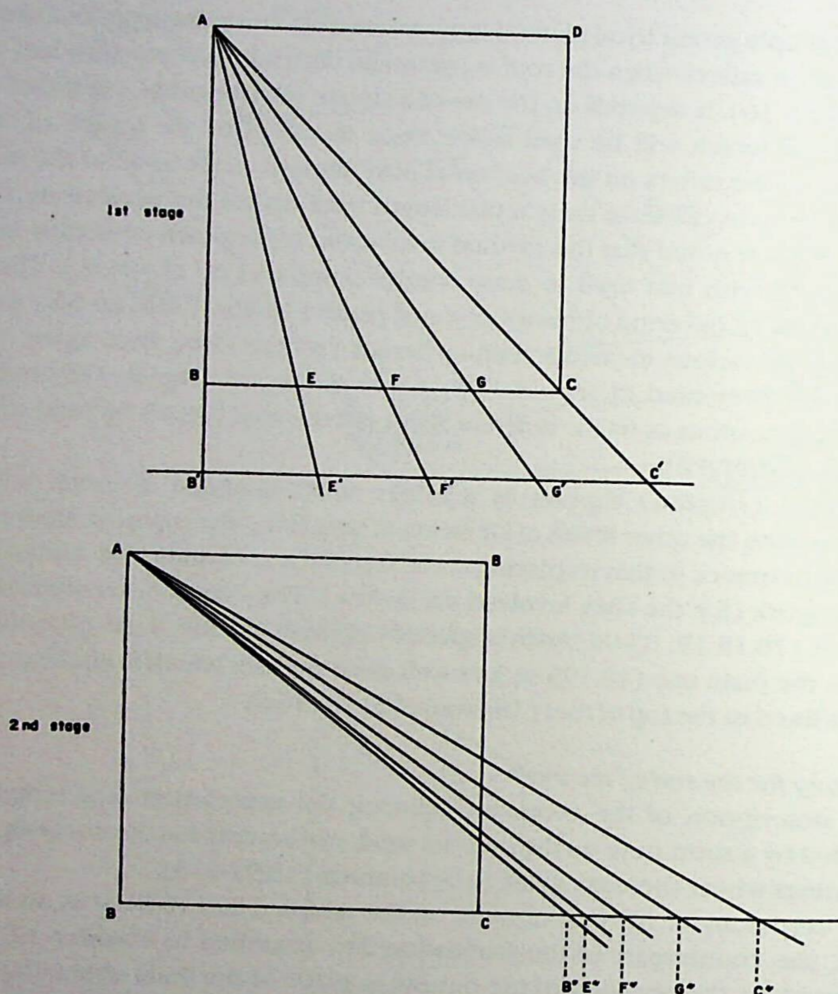


Fig. 12
Calculating the rafters (18.23 sq.)

AB = Ka line; *BC* = Āsana line; *CD* = Sīma line; *DA* = Uṣṇīṣa line.

1st stage: Calculating the projection of rafters onto a horizontal plane:

A being the centre of the roof *AB* is half the width of the frame on which rest the rafters and *AB'* half the total width of the roof; *AC'* is the projection of the median rafter: *AE'*, *AF'* and *AG'* are the respective projections of the intermediate rafters (*madhyakarṇa*, *ākarṇa*, *anukoṭi*, see 18.30).

2nd stage: Calculating the length of rafters:

A being the top of the roof. *AB* is its height: *BB"*, *BE"*, *BF"*, *BG"*, and *BC"*, are the lengths of the projection of the rafters (=*AB'*, *AE'*, *AF'*, *AG'*, *AC'*,) *AB"*, *AF"*, *AG"* and *AC"*, are the total lengths of the rafters.

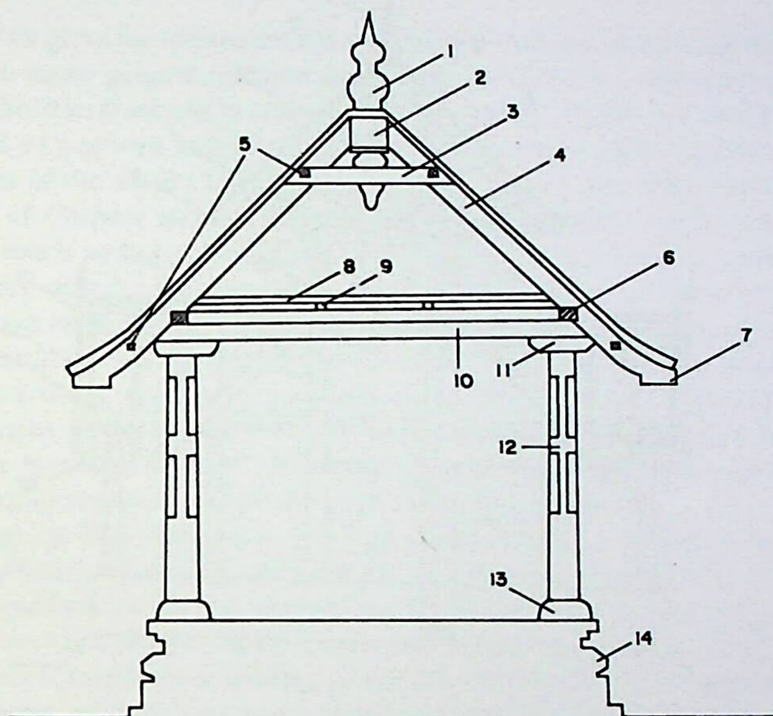


Fig. 13
Timber work of a pavilion with a pyramidal roof in Kerala
(according to P. Ramakrishnan Achary)

1. finial (*stūpikā*); 2. newel (*kūṭa*); 3. collar beam (*bandha*); 4. rafter (*lupā*); 5. lierne (*valaya*); 6. wall plate (*kṣudrottara*); 7. eave (*nīvara*); 8. plank floor (*phalaka*); 9. beam (*tulā*). 10. architrave (*uttara*); 11. bracket capital (*potikā*); 12. pillar shaft (*stambha*); 13. pillar base *stambhapīṭha*); 14. base (*adhiṣṭhāna*).

preceding chapters, with the repetition of the level of pillars and entablature when the edifice has more than one storey. The plan of the ground floor may be reduced to one central room, the sanctum (*garbhagṛha*, *nālīgṛha*) surrounded by a wall, but aisles (*alindra*, *vāra*) may intervene between the sanctum and the exterior wall; the partition wall which surrounds the sanctum is then called *gṛhapiṇḍi* and the exterior wall is often qualified by *hāra*. The entrance to this main building may be preceded by a pavilion (*mukhamaṇḍapa*) which might be said to play the part of a nave. The ground floor is the only 'habitable' storey of the temple[32] and when the upper storeys which are always 'false-storeys' are

32. Exception would have to be made for the Viṣṇu temples with three superposed sanctums (above note 6), but they are not touched upon in the descriptions given here.

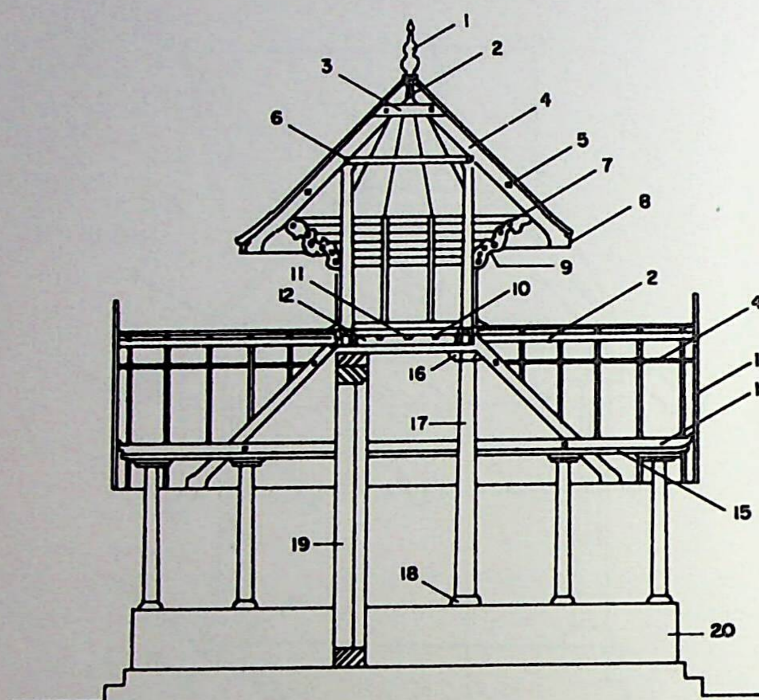


Fig. 14
Timber work of a temple gateway in Kerala
(according to P. Ramakrishnan Achary)

1. finial (*stūpikā*); 2. ridge beam (*vaṃśa*); 3. collar beam (*bandha*); 4. main rafter (*lupā*); 5. lierne (*valaya*); 6. wall plate (*uttara*); 7. secondary wall plate (supported by braces, *viṣkambhottara*); 8. eave (*nīvra*); 9. brace (*viṣkambha*); 10. plank floor (*phalaka*); 11. joist (*jayanti*); 12. beam (*tulā*); 13. gable (*mukhapaṭṭikā*); 14. secondary wall plate (*kṣudrottara*); 15. wall plate (*uttara*); 16. bracket capital (*potikā*); 17. pillar shaft (*stambha*); 18. pillar base (*stambhapīṭha*); 19. doorpost (*dvārastambha*); 20. base (*adhiṣṭhāna*).

concerned, the description of their plan is most often limited to indications as to the arrangement of aediculae (*kūṭa*, *koṣṭha*, *pañjara*) and dwarf-galleries (*hārā*) which surround them. These decorative elements which are placed at the top of the storey directly below, are considered as belonging to this storey and not to that which they surround.[33] Aediculae are projecting and correspond to projections of the facade below them, while dwarf-galleries appear as recessed and correspond to the bare wall of that facade.

33. On a possible technical justification for use of aediculae and dwarf-galleries, see G. Hoekveld-Meijer, *Koyils in the Colamandalam, Typology and development of early Cola art*, Amsterdam 1981.

Chapter 19 gives the characteristics of temples with one storey (*ekatala*) and some much more general indications. Among these latter a description of the pavilion placed in front of the entrance is to be noted (19.4-8, see also 21.18 sq. and 25.188-91), as well as list of synonyms designating temples (19.10-12), the proportions of the finial (19.15-17, see above Chapter 18), those of the door (19.20-22, cf. Chapter 30) and the description of the temple's exterior gargoyle (*nāla*); to this is added a classification of buildings according to the differences of plan there may be between their upper levels (attic, roof) and the others (classification *nāgarādi*, 19.35-38; see also 21.99, 35.8);[34] lastly, there is a list of images to be found on the facades of a Śiva temple (19.39-48). The dimensions and proportions of single storey temples are indicated (19.1-3), as well as the various shapes of their plan (19.3-4) and the proportions of their sanctum (19.13-15). The different types of temple are distinguished by their plan and by the presence or absence of aediculae and of foreparts (*bhadra*).

Following on from the proportions and dimensions of temples with two storeys (*dvitala*), Chapter 20 describes fifteen of those temples (fig. 15). Next are given indications for the arrangements of aediculae (20.10-12), for the decorative arches (*toraṇa*, 20.36-39, see also 21.29 sq. and 69 sq.) and, lastly, a classification of buildings according to the materials used and the nature, more or less massive, of their structure (classification *sañcitādi* 20.31b-34, see also 35.8b-9a).

Chapter 21 gives, in more or less detailed ways the eight types of three storey temple and, in particular, of the apsidal temple (*hastipṛṣṭha*, *dvyaśravṛtta*); this description is interrupted by two passages which are probably interpolations and which deal, one with the pavilion placed before the entrance of the temple (21.18-20, see also Chapter 19) and with the position of the aediculae in relation to the *mānasūtra* (21.21-23, cf. Chapter 6) and the other with the *stambhatoraṇa*, a decorative motif on the facades (21.29-33). The chapter ends with general observations on aediculae (*kūṭa*, *koṣṭha* . . . 21.61-64), on buildings with and without aisles (*anarpita* and *arpita*) (21.64-65, cf. 26.14 and 35.8-9a), on the sanctum, on the stereobates and on the decorative arches (21.68-80).

Chapter 22 is about temples with four to twelve storeys. Whilst the description of four storey temples is relatively detailed (22.2-54, fig. 16), the description of those with five concentrates solely on the division of their elevation (22.55-57). A much simpler method of presentation is used for what follows, which gives only the proportions of the base and of the ground floor, it being understood that the base, as indicated for a temple of six storeys for

34. About the pseudo-geographical classification *nāgarādi* see below Chapter 19 note 31.

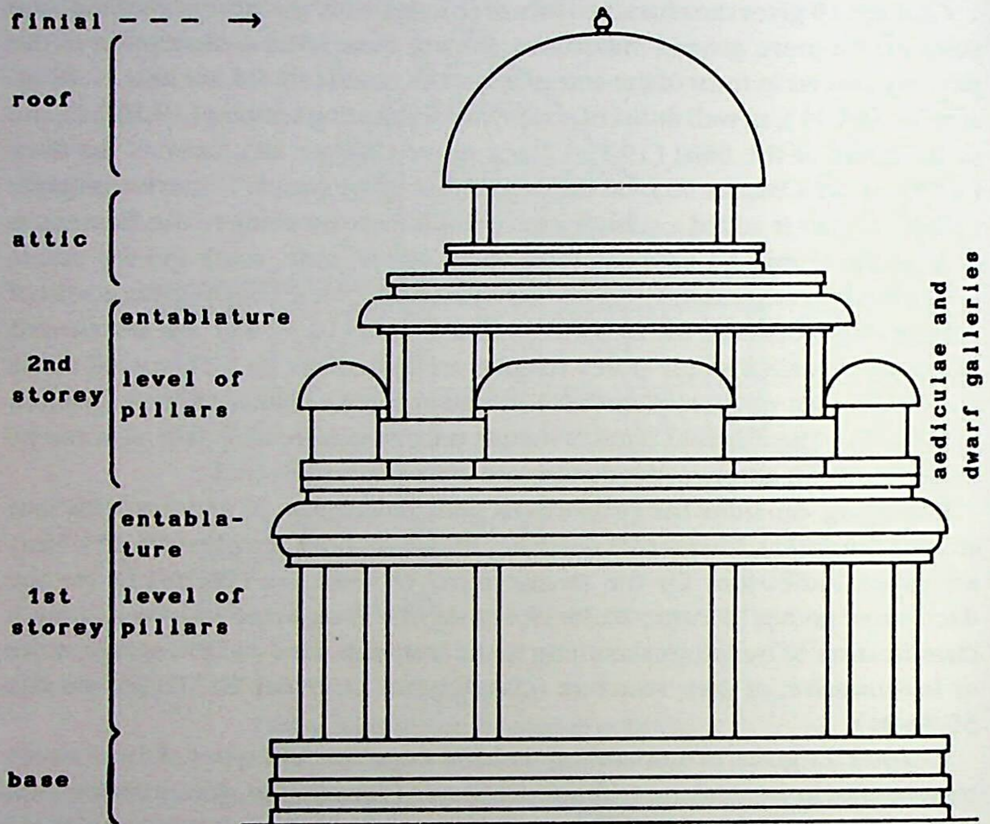


Fig. 15
Two storey temple (svastika type) (20.6-7)

example, is but in place of that of a five storey temple whose ground floor becomes the second storey of a six storey temple . . . etc. The chapter ends by returning to the subject of aediculae and by giving rules for their arrangement (22.76-92).

Enclosures and gateways

The temple is surrounded by an enclosure (*prākāra*), or by several concentric ones, which delimit courts in which various annexes are arranged. Chapter 23 describes these different enclosures, there being five of them at most, and the next describes the corresponding gateways. These enclosures are drawn with the help of nested diagrams (23.2-17). The height and thickness of their walls increase towards the exterior (23.18-25) and cloister-like galleries (*mālikā*) may be built up against those walls (23.26-31 and 68-73). Amongst

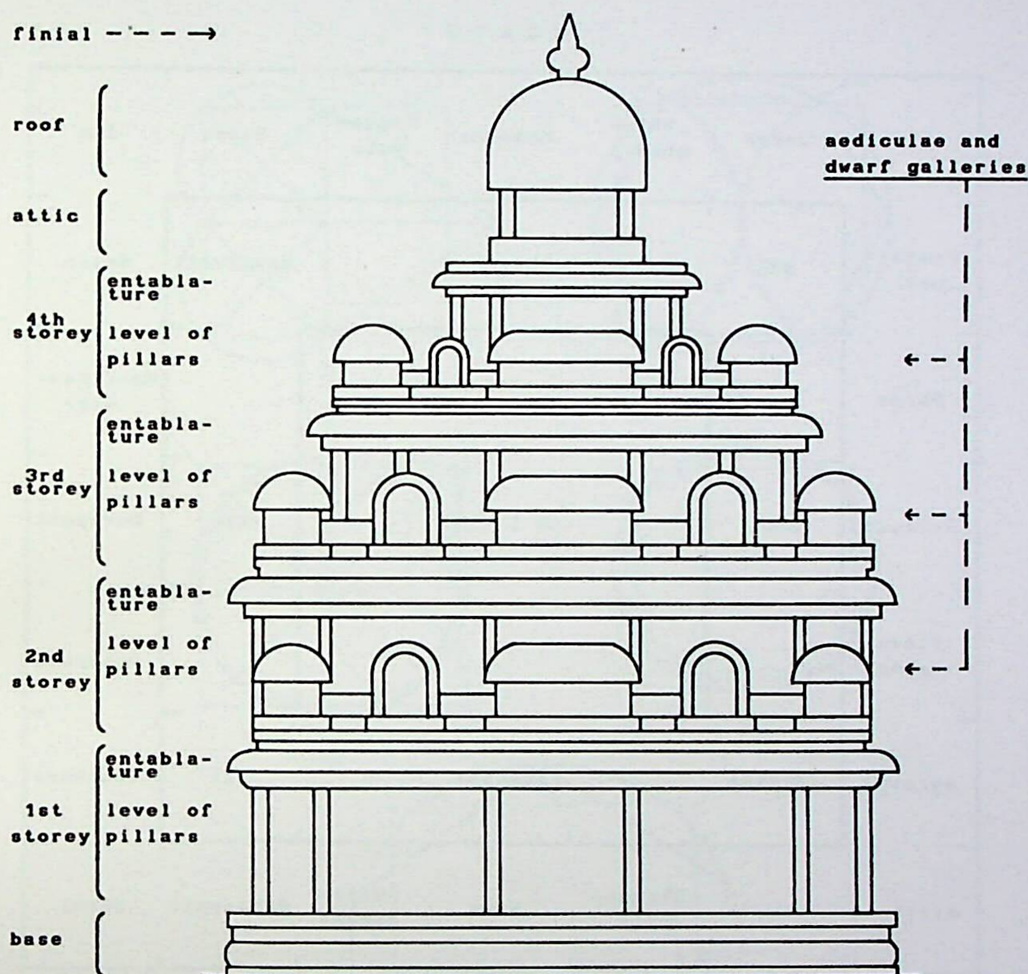


Fig. 16
Four storey temple: subhadraka type (22.3 sq.)

annexes installed in the courts, the foremost are the shrines of the Attendants (*parivāradevatā*) and lists are given, of eight, twelve, sixteen and thirty-two Attendants of Śiva (23.39-58, fig. 17) as well as lists of those of Viṣṇu (23.98-106). The end of the chapter also gives an iconographic description of the bull (Vṛṣa), principal Attendant of Śiva (23.107-131). In the courts beside these shrines are altars and a flagmast (23.74-83, 88-91) as well as various service buildings (23.83-88). The house of the temple priests is in one of the enclosures (23.92) but those of other personnel are outside them (23.96).

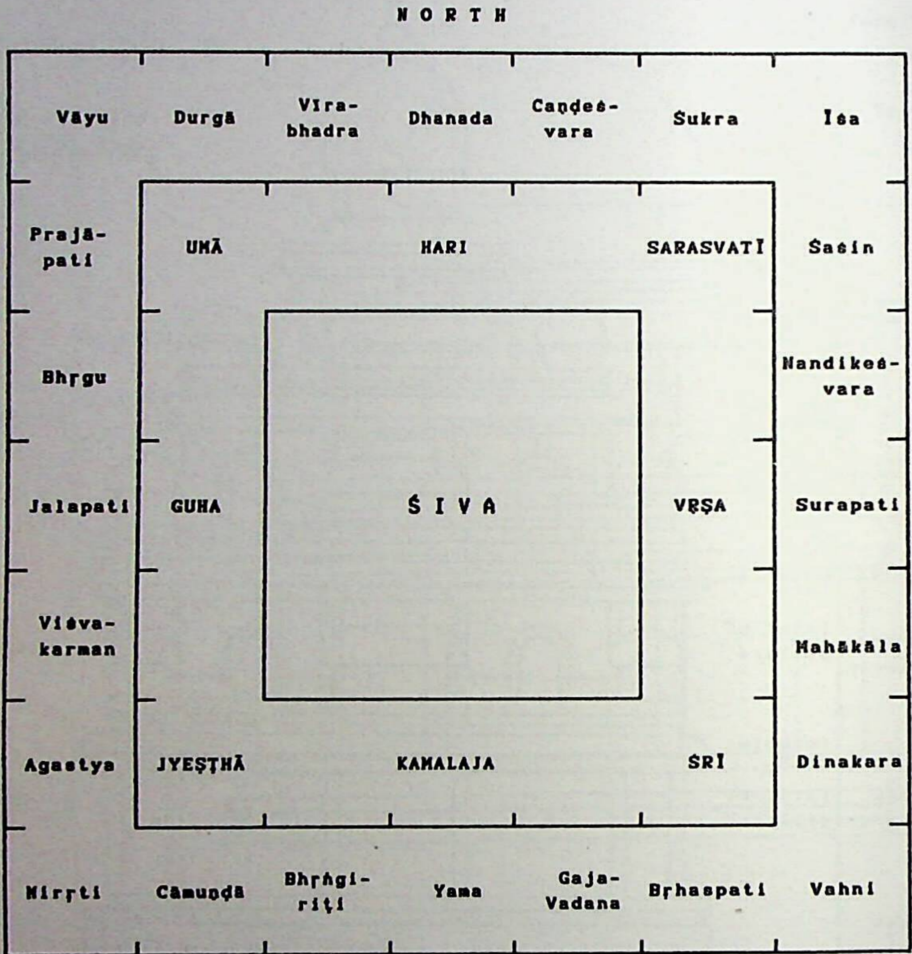


Fig. 17
Śiva's Attendants (23.45b-52)

The gateways (*gopura*, cf. 24.2) corresponding to these five enclosures increase in size the further they are away from the temple and they may have upto seven storeys (24.2-36); they are very similar to the temples described in the preceding chapters; they are almost always rectangular and have a wagon-roof; the resemblance is emphasized in the specific descriptions (24.36 sq.) by the use of terms, which usually designate the shrine of a temple, to designate here the central passage characteristic to gateways. Gateways are also dealt with in chapter 30 in a slightly different way (see below).

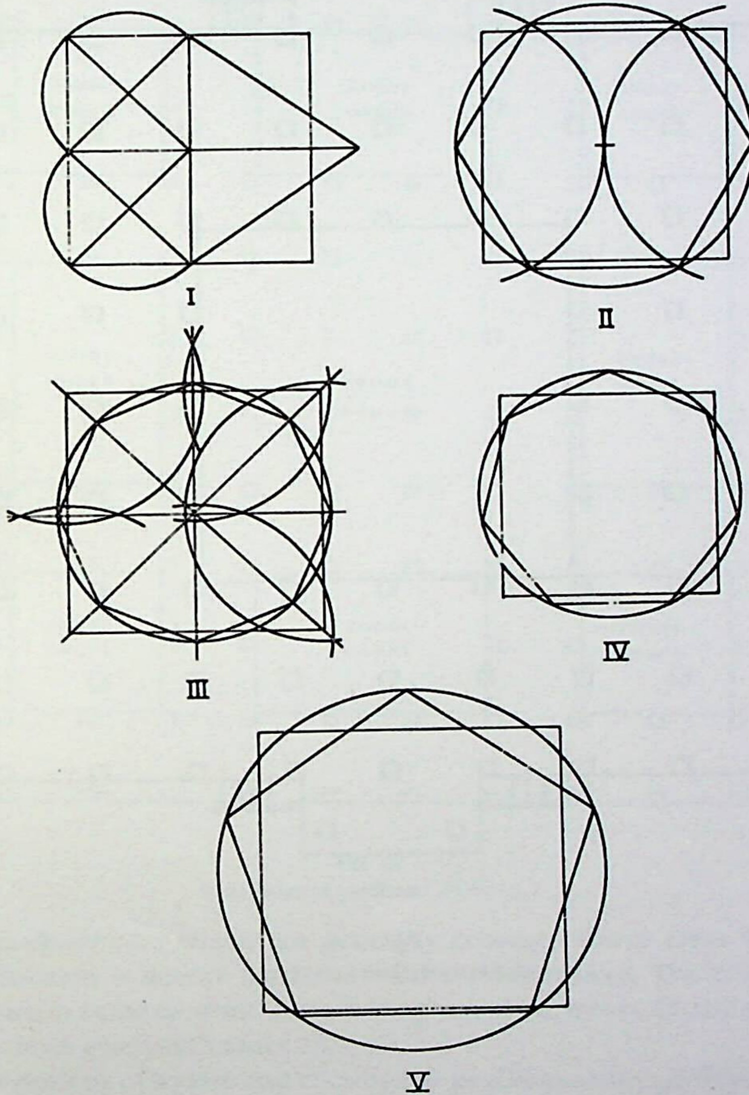


Fig. 18
Drawing the firepits

1. vulva form firepit (*yonikuṇḍa*, 25.47); II. hexagonal firepit (*ṣaḍaśrakuṇḍa*, 25.50); III. octagonal firepit (*aṣṭāśrakuṇḍa*, 25.52); IV. heptagonal firepit (*saptāśrakuṇḍa*, 25.53); V. pentagonal firepit (*pañcāśrakuṇḍa*, 25.54).

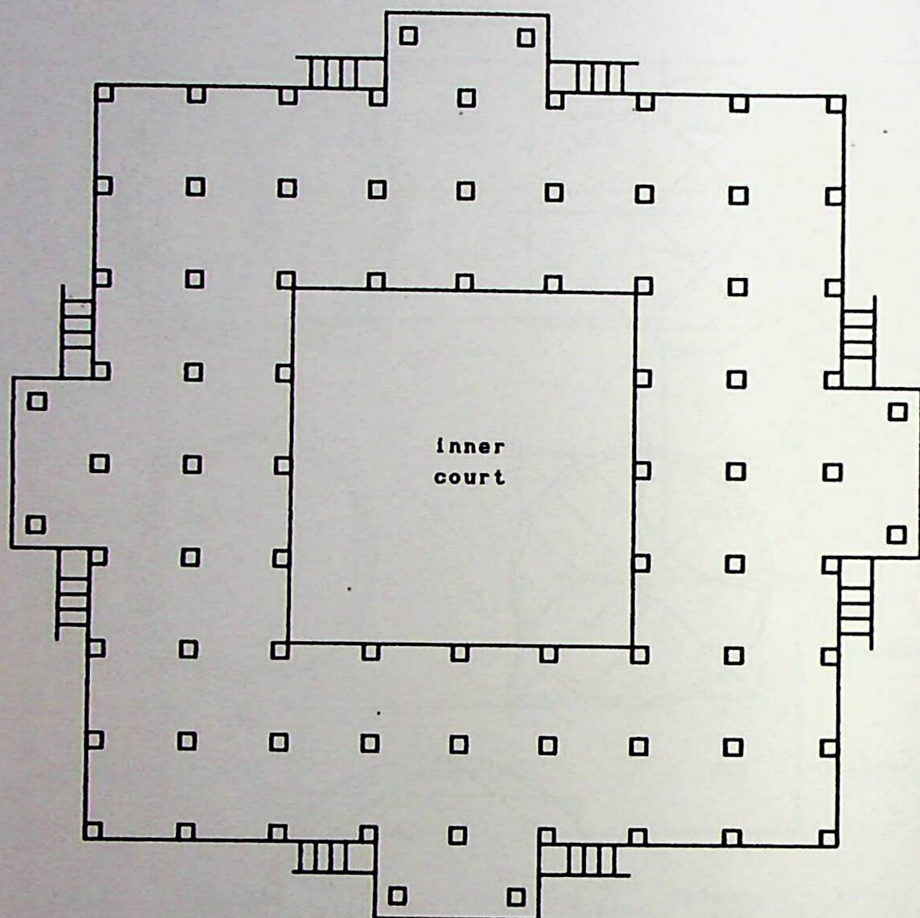


Fig. 19
Alaṅkṛta pavilion (25.76 sq.)

Pavilions

Chapter 25 describes the pavilions (*maṇḍapa*, 25.1-197) and the halls (*sabhā*, 25.198-237). The pavilion is somewhat the all-purpose building of Indian architecture (cf. the list of its uses given here 25.2b-5). It is usually characterized by a three level elevation (base, 'pillars', entablature 25.25) but it appears in simplified variations which do not comprise a base (*prapā*, 25.26-29). The edifice may or may not be hypostyle but in every case the unit of reference for the proportions is the intercolumniation (*bhakti*), whether real or supposed (25.13-16). The roof is usually flat but may comprise one or more

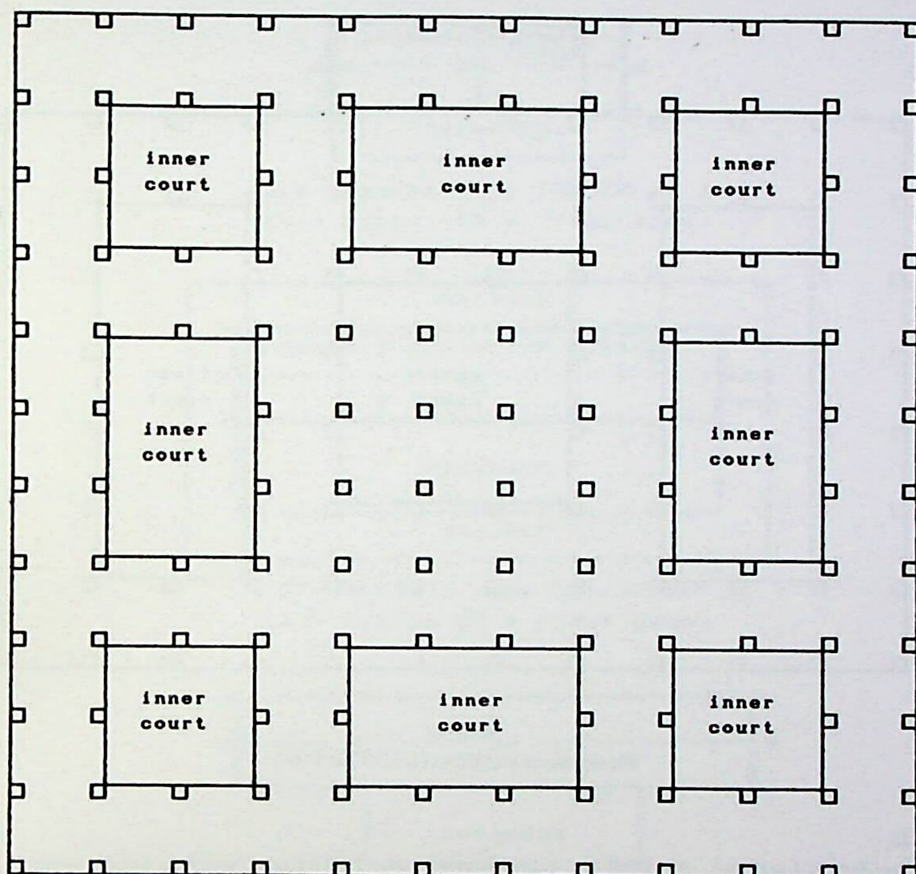


Fig. 20
Kuladhāraṇa pavilion (25.86 sq.)

lanterns (*ūrdhvakūṭa*) which are generally arranged above areas where the intercolumniation is double or treble what it is elsewhere. The pillars of the *maṇḍapa* are in stone or wood and a list is given of the trees (25.182 sq.) which completes those given in Chapter 15.

The descriptions of square and rectangular pavilions rarely go beyond a brief run down of the plan of the edifice. As well, there is the description of a pavilion for water games (25.176-81) and notes on the pavilion in front of the temple (*mukhamaṇḍapa*), on the foundation deposit, on the gallery which may be attached to the facades of a pavilion and on the cloisterlike galleries (*mālikā*, 25.188-97). Lastly, the way to draw sacrificial pits (*kuṇḍa*) is inserted into the description of a pavilion such as may be used for sacrifices (25.43-56): especially featured here are simplified methods for drawing regular polygons without recourse to trigonometry (fig. 18).

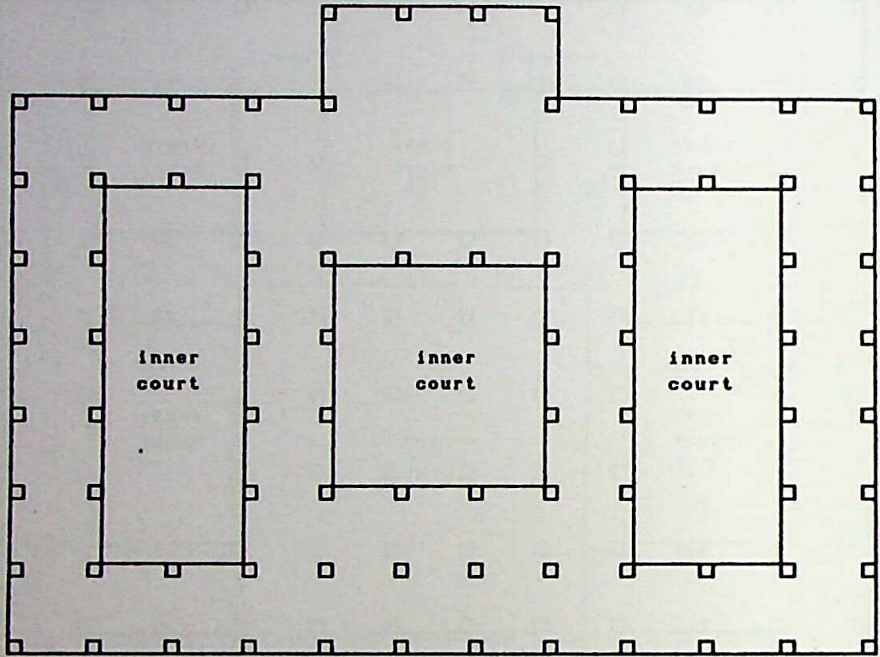


Fig. 21
Iśvarakānta pavilion (25.155b-159)

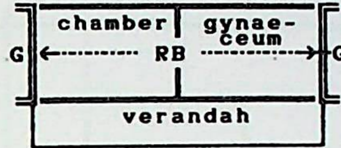
Halls

The halls (*sabhā*, 25.189 sq.) are hypostyle buildings with a large space free of pillars in the centre and with a wagon-roof, hipped or not. The essential matter in the description of this roofing poses the same unresolved problems as do indications of the same type given in Chapter 18.

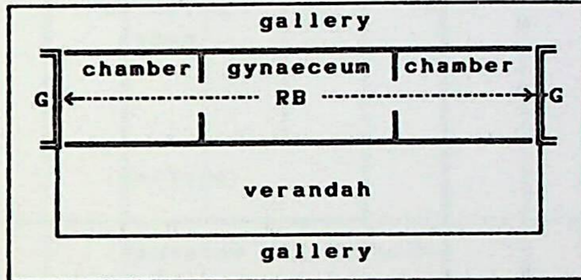
Dwelling houses

The description of dwelling houses is the subject of Chapters 26 and 27 (Chapter 28 touches only upon the rite of first entry) and it may be said that, roughly speaking, the first gives the different types of plan for the edifice which constitutes the house itself and the second gives the rules relative to the layout and arrangement of this building and of its surroundings, rules which vary according to the social class of the occupants; these two chapters dovetail, however, and it is worth noting that a number of their verses are found mixed into the parallel passages of the *Pūrvakāmikāgama* which, in this and in other aspects, comes very close to the *Mayamata*.

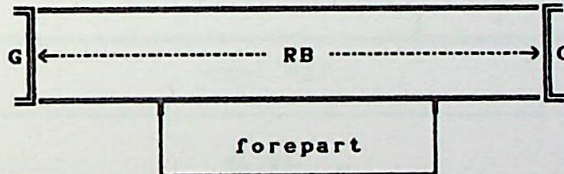
Houses appear as the juxtaposition of one or several 'closed' elements (main buildings: *śālā* . . .) and one or several 'open' ones (galleries, verandahs,



3rd daṇḍaka type (26.28 sq.)
(G = gable; RB = ridge beam)



5th daṇḍaka type (26.32-35)
(G = gable; RB = ridge beam)



svastika type (26.39b-40)
(G = gable; RB = ridge beam)

Fig. 22
Houses with a single main building

porches, courtyards, courts . . .); the number of possible combinations is considerable and some of them are presented in Chapter 26 where houses are classified according to the number of their main buildings (one, two, three, four, seven or ten) and to the arrangement of these main buildings in relation to 'open' elements. It is the term *śālā* which most often designates a main building (hence the expressions *ekaśāla*, *dviśāla*, etc. . . .) but *gṛha*, *vāsa* and *koṣṭha* are used too, and are all ambiguous, even *śālā* being equally applicable to the house as a whole, or to some outward elongated structures, or to a roof shape, to say nothing of stables and the like (*aśvaśālā*, *hastiśālā*, etc.). A main building is usually an elongated edifice covered with a wagon-roof or a saddle-back roof

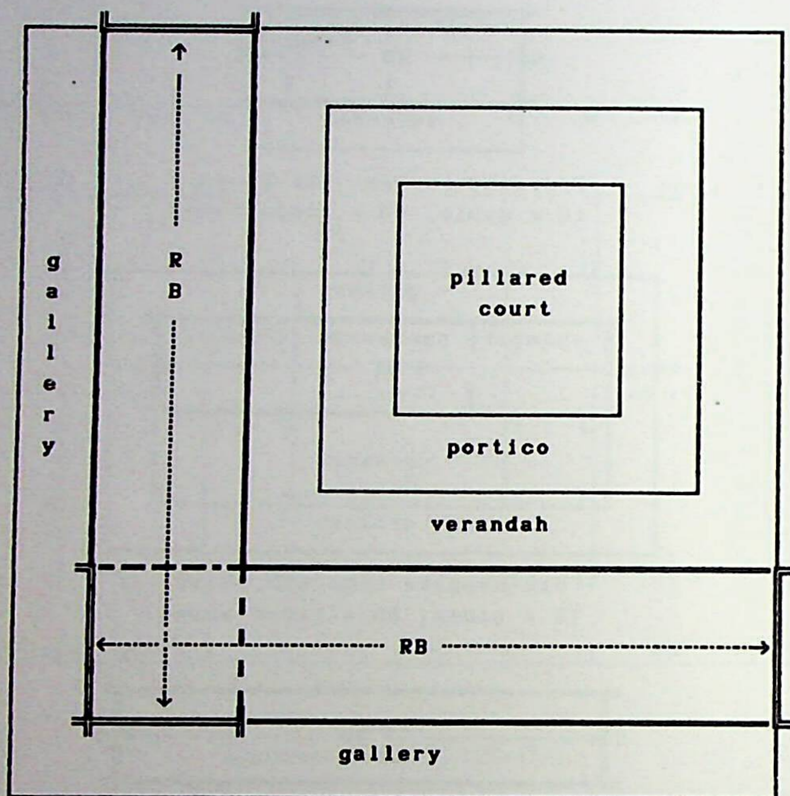


Fig. 23
Two main building house: caturmukha type (26.47 sq.)
(RB = ridge beam)

with a gable at each of its ends; it may consist of a single piece but is more often divided into two or three by one or two partition walls; distinguishable amongst these rooms are one or more chambers (*vāsa*) and the women's apartments (*raṅga*) (fig. 22); when there are only two rooms, then the chamber is the domain of the master of the house, the *raṅga* that of the mistress of the house (27.133) and the wall separating them is called the 'median wall' or 'wall of Ka' (that is, of Brahmā); it is to pass above the foundation deposit and to be penetrated by a door of the specific type called *kulyābhadvāra* (vaulted door?). When a house comprises several main buildings, these may be attached to each other (*abhinna* or *piṇḍa* modes) or may be separate (*bhinna* mode) but the various arrangements described all seem to correspond to houses with joined main buildings (except perhaps for 26.195). These main buildings are always at right angles to one another, but are joined according to different modes: for example two main buildings may interpenetrate and their ridge beams

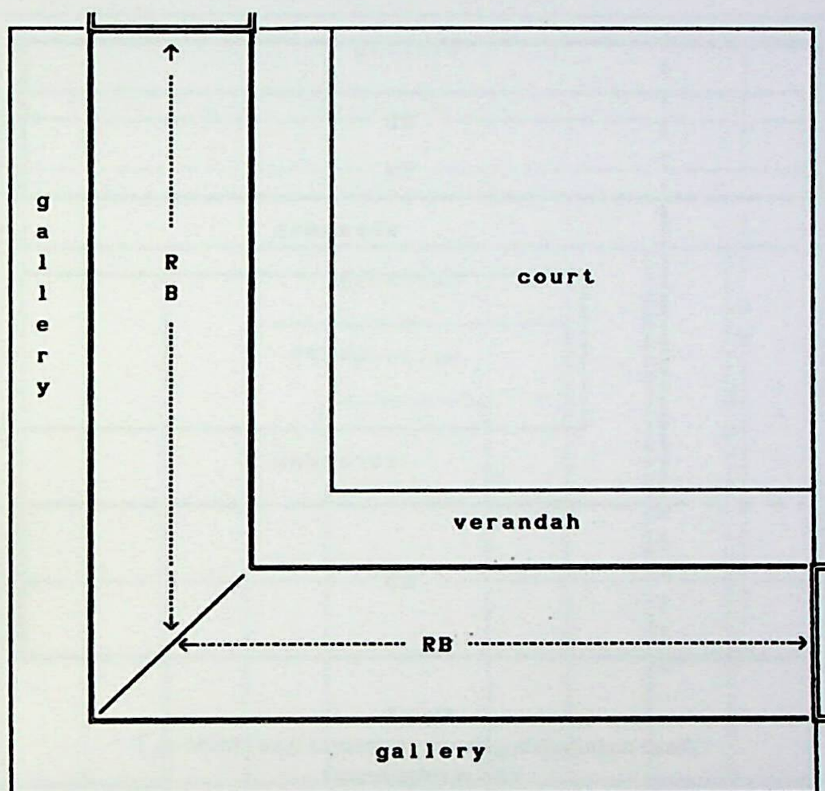


Fig. 24
Two main building house: daṇḍavaktra type (26.54-55)
(RB = ridge beam)

intersect, or the main buildings may be joined end to end in which case corner rafters will mark the joining of their roofs (figs. 23-32).

The 'open' elements are designated by various terms which are apparently interchangeable (*alindra*, *vāra*, *aṅgaṇa*, *maṇḍapa* . . .) and may all be applied to hypostyle structures or to uncovered areas, whether or not bordered on several sides by constructions; when it comes to the simplest house, with a single main building, the open element is made up of a gallery or a verandah running along on of the sides of the main building (fig. 22); but the arrangement is usually more complex — especially for edifices with multiple main building — and the mention, in one description, of various juxtaposed open elements, shows that the vague and interchangeable terms which designate them correspond to well defined realities which it has not been possible to identify; we note at this point however that the principal open elements of the houses

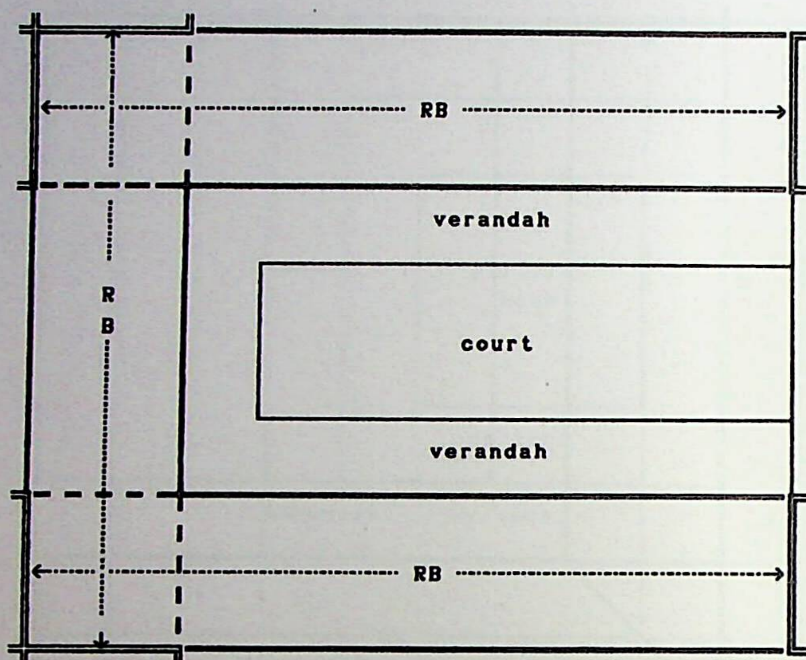


Fig. 25
Three main building house: merukānta type (26.56 sq.)
(RB = ridge beam)

with several main buildings is a court within the main buildings where the central pavilion and the alter to Brahmā are to be placed (27.20 sq.).

Secondary elements such as porches, foreparts or outward constructions may eventually be added to these open and closed principal parts (fig. 27). Though there are constant mentions of edifices with multiple storeys elsewhere in the text, it should be noted that the only detailed description of such a construction (26.119) is very muddled and it is difficult to understand the arrangement of its (six?) upper storeys.

As shown above, the houses are classified according to the number of the main buildings, each category being again divided into types and variations determined by different factors, such as the way of joining the main buildings, the number and arrangement of open elements and the presence or absence of a particular secondary feature. The text has little to say about the *dviśāla* (or *lāṅgala* 'ploughshare shaped') and *triśāla* (or *śūrpa* 'winnowing basket shaped') (26.47 sq.; figs. 23-26) nor about the *saptaśāla* and the *daśaśāla* (26.190-93; figs. 31-32) neither are these categories of houses very much dealt with in the rest of the work. It does, on the other hand, describe the many

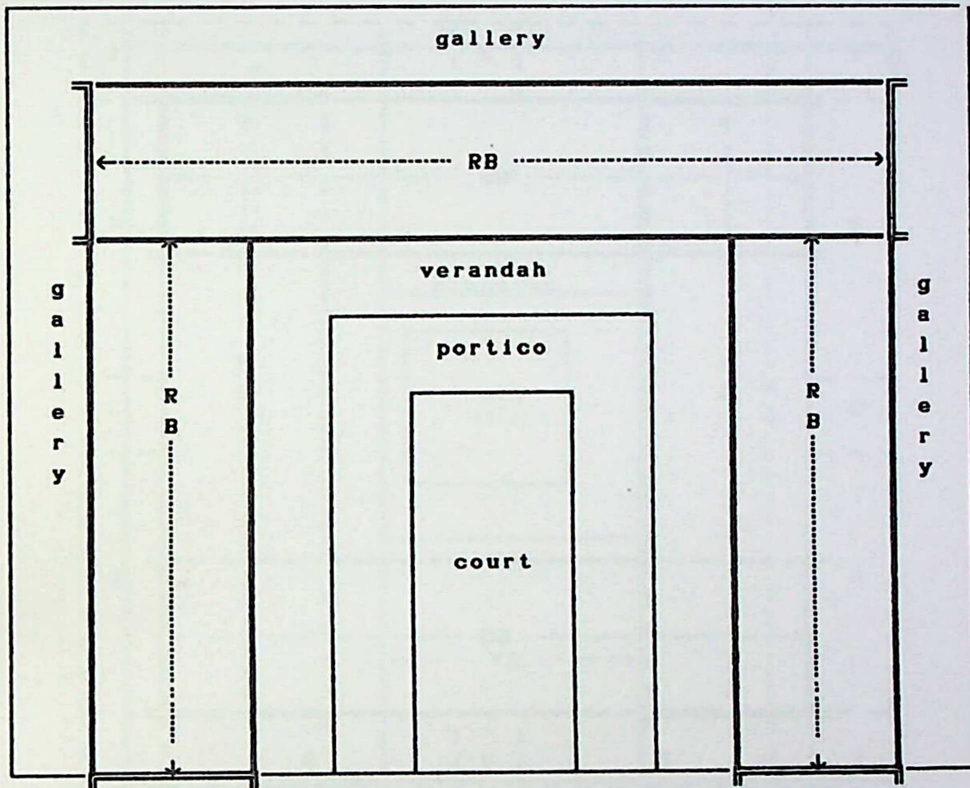


Fig. 26
Three main building house: maulibhadra type (26.59-62)
(RB = ridge beam)

houses with one main building (*ekaśāla:* 26.11-46), and, more than that, those with four (*catuśśāla*: 26.64-187) thus concerning itself, in the one case as in the other with the houses which are most common: basic houses intended for villagers or for citizens of modest means and houses with a central court for the well-to-do (see especially 29.83 sq.).

Dwelling houses are not the only *śālā* to be described by the *Mayamata*; buildings as diverse as the following are put into the same category: monastic buildings (*vibaraśālaka*), stables for horses and for elephants (*aśvaśālā, basti-śālā*), to say nothing of buildings for alms (*dānaśālā*) and other edifices of the kind which are frequently mentioned but which are not described (29.188 sq.): *bastiśālā* and *aśvaśālā* are mentioned again in connection with palaces, apropos of which they are described (29.168-87); monastic buildings (26.200) are presented as a specific kind of edifice with several main buildings: these, numbering eleven, are parallel to one another and both the two principal

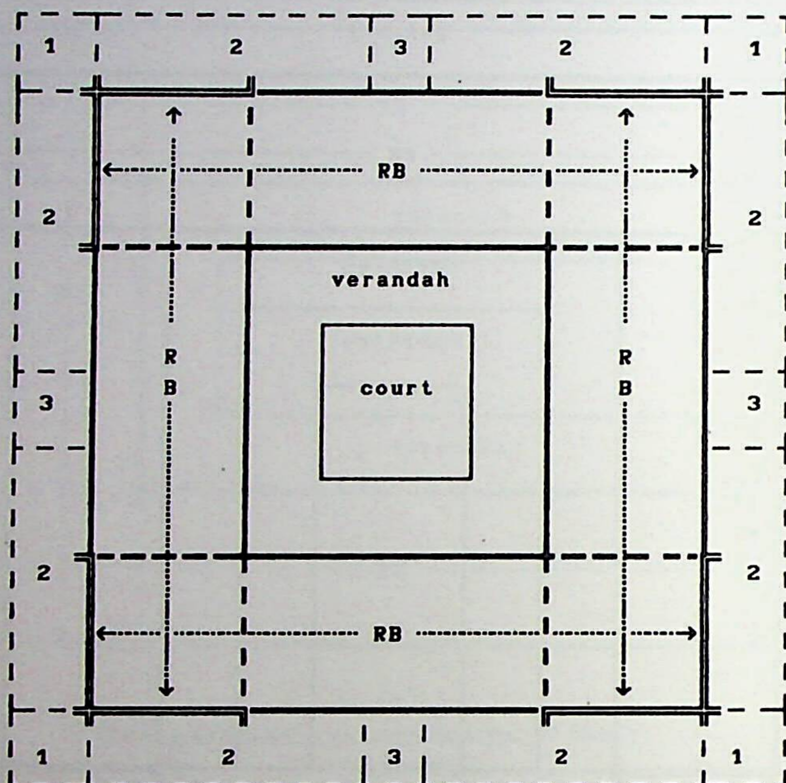


Fig. 27
Four main building house: 1st sarvatobhadra type (26.73 sq.)
(1 = corner room; 2 = outward gallery; 3 = forepart; RB = ridge beam)

facades of the resulting assembly are constituted by the juxtaposition of eleven gable walls.

Chapter 27 deals, for the most part, with the procedure for laying out a *catuśśāla* along with a list of the appurtenances and dependencies which belong to it and indications as to the positions they are to occupy; in this chapter are to be found the rules, both those general ones which are applicable in all cases, and the specific ones for whichsoever social class. The layout begins with the marking out of the limits of the area in the middle of which the house is to stand, which area is surrounded by a wall (*vaṭabhitti*, 27.1 onwards); then a sixty-four square diagram must be drawn on the ground, whose dimensions are those of the house to be built and where the vulnerable points are to be marked (*marma*, 7.49 and 18.15). Then the medians of the four sides of the diagram are drawn and will be used for the layout of the central pavilion and then of the

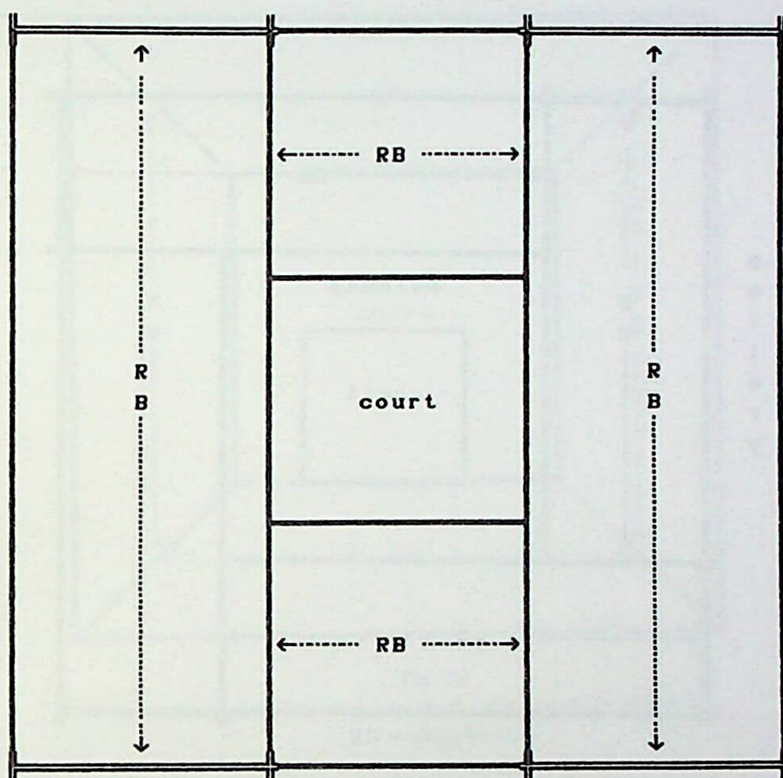


Fig. 28
Four main building house: 1st vardhamāna type (26.102 sq.)
(RB = ridge beam)

principal main building. The central pavilion is set up right in the centre of the diagram, that is to say in the centre of the inner court of a *catuśśāla* (27.20); its presence is not always mentioned in descriptions of the *catuśśāla* given in Chapter 26 and it is possible that it is often a provisional building, due to vanish when the house has been constructed; whether or not this is the case, it is at the centre of this pavilion that the altar to Brahmā will be built, where will be carried out the daily domestic rites (unless the house is for *śūdra* who have no right to such an altar). The name and position of the principal main building vary according to the category to which the occupants of the house belong, but it is always essential that the median of this main building does not coincide with the corresponding median of the diagram (27.36 and following). If the house is meant for brahmins then this main building is called *sukhālaya* (or *saukhya*) and it is to the north of the central pavilion. If it is for a *kṣatriya* it is an *annālaya* (or *mahānāsā*) which is to the east and, for *vaiśya* a *dhānyālaya* to

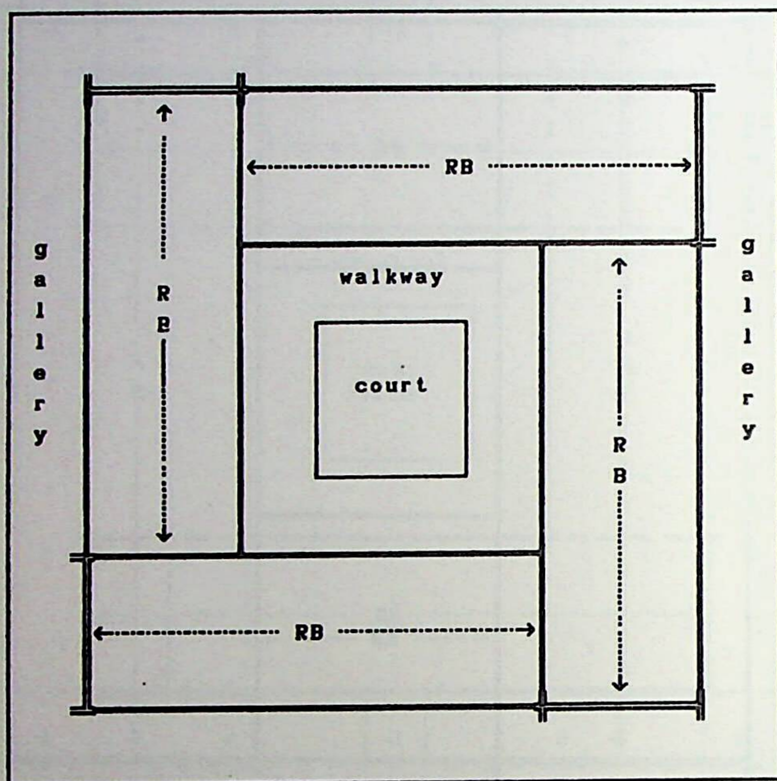


Fig. 29
Four main building house: 2nd nandyāvarta type (26.156 sq.)
(RB = ridge beam)

the south and, lastly, for *śūdra*, a *dhanālaya* is built to the west. These names which correspond to those of the medians of the diagram (*sukhasūtra*, *annasūtra* . . . etc.) are unexpected (especially where they concern *kṣatriya*) and the real explanation has yet to be found. Another difficulty arises in establishing a relationship between what is indicated here and the rules previously given apropos of sites (Chapter 2 verse 10 and following); in fact the position of the principal main building determines, first, that of the main building in which is the door of the *catuśśāla*, (to the left of the principal main building from the point of view of one facing towards the centre of the site), and then that of the drain for used water (positioned to the right at the back of the principal main building); otherwise, it is said in Chapter 2 that the site intended for brahmins must slope towards the north and for the other three classes, towards the east; this being the case, if the position of the drain is then well

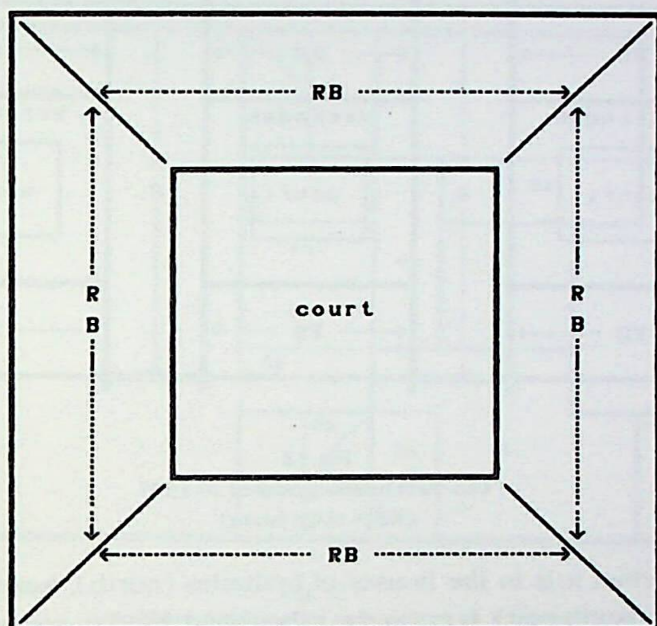


Fig. 30
Four main building house: rucaka type (26.186 sq.)
(RB = ridge beam)

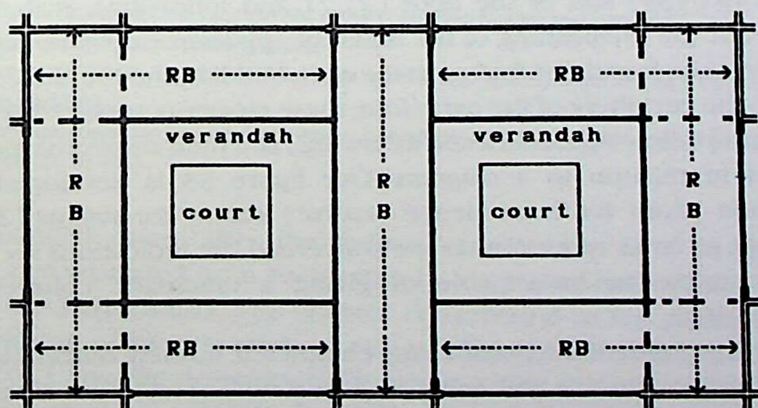


Fig. 31
Seven main building house (26.190)
(RB = ridge beam)

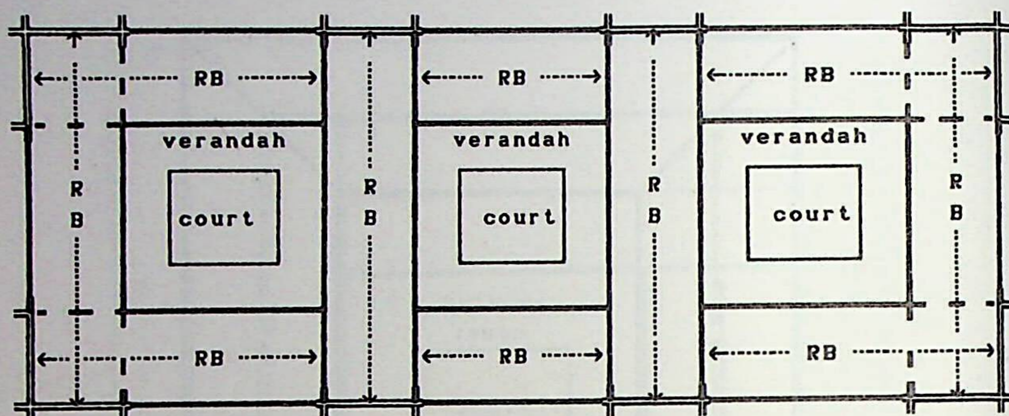


Fig. 32
Ten main building house (26.193)
(RB = ridge beam)

understood when it is in the houses of brahmins (north), *kṣatriya* (east) and *vaiśya* (south/south-east), it is, on the other hand, hard to see how this works when a house is destined for *śūdra*, since the drain is placed to the west of this house, that is, at the point which is, theoretically, the most elevated.

Once the principal main building has been set up the position of the foundation deposit must be determined (27.58 and following) as well as those of the master's chamber (*vāsa, svāmisthāna*), of the women's apartments (*raṅga*) (27.133) and of the door (27.71 and following); that done, there remains but the establishing of the different appurtenances and dependencies which are to be found, the former in the main building and the latter, as it would seem, on the periphery of the *catuśśāla*; these elements are listed several times (27.100 and following, 26.112 and following) and their respective positions are indicated in relation to a diagram. Our figure 33 is developed from the information given for a residence (*vastu*!) meant for *vaiśya* (27.112 and following); as far as other classes are concerned the indications are too sparse and incomplete to be capable of giving a minimally coherent graphic representation.

The construction of the house being completed, nothing remains but to enter it on an auspicious day and according to a well established ritual which is described in classic fashion (Chapter 28).

Royal palaces

The royal palace (Chapter 29) has the form of a cluster of buildings, very diverse and with many large free spaces; the ensemble will be situated within a

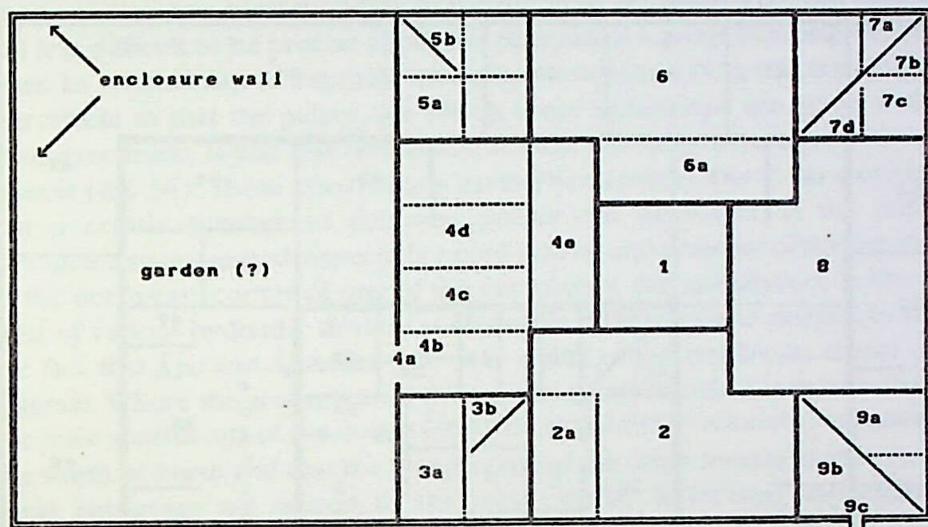


Fig. 33
Kāyabhāra dwelling for vaiśya (27.112-120)
(sketch based on maṇḍūka diagram, see 27.113 and fig. 5)

1. Central pavilion and alṭar of Brahmā.
2. Principal main building (*dhānyālaya*, 27.49-51); 2a. women's quarters.
3. South-west appurtenances: 3a. women's quarters; 3b. armoury.
4. Western main building: 4a. entrance; 4b. chariot shed; 4c. alms room; 4d. granary; 4e. guest chamber.
5. North-west appurtenances: 5a. mortar; 5b. store (clarified butter and simples).
6. Northern main building: 6a. treasure room.
7. North-east appurtenances: 7a. shrine; 7b. store (poisons); 7c. store (antidotes); 7d. well.
8. Eastern main building.
9. South-east appurtenances: 9a. kitchen, store (condiments); 9b. dining room pavilion; 9c. sewage outlet (27.51-52).

town or a fortified camp; after the fashion of a temple it is arranged in concentric zones separated from each other by enclosure walls (three or five according to the *Mayamata)*. The chapter consecrated to the palace gives a general description of various kinds of palace intended for rulers of different status (29.1-161). Specific descriptions of various edifices which make up part of the palace are given as well (29.168-228) and some notes on the town which surrounds it (29.65 and following, 162 and following), specifications which go to complete the information given in Chapter 10 where the different types of city are described.

Four plans are suggested for palaces and, as with temples or residential houses, their different elements are situated according to diagrams; but, except

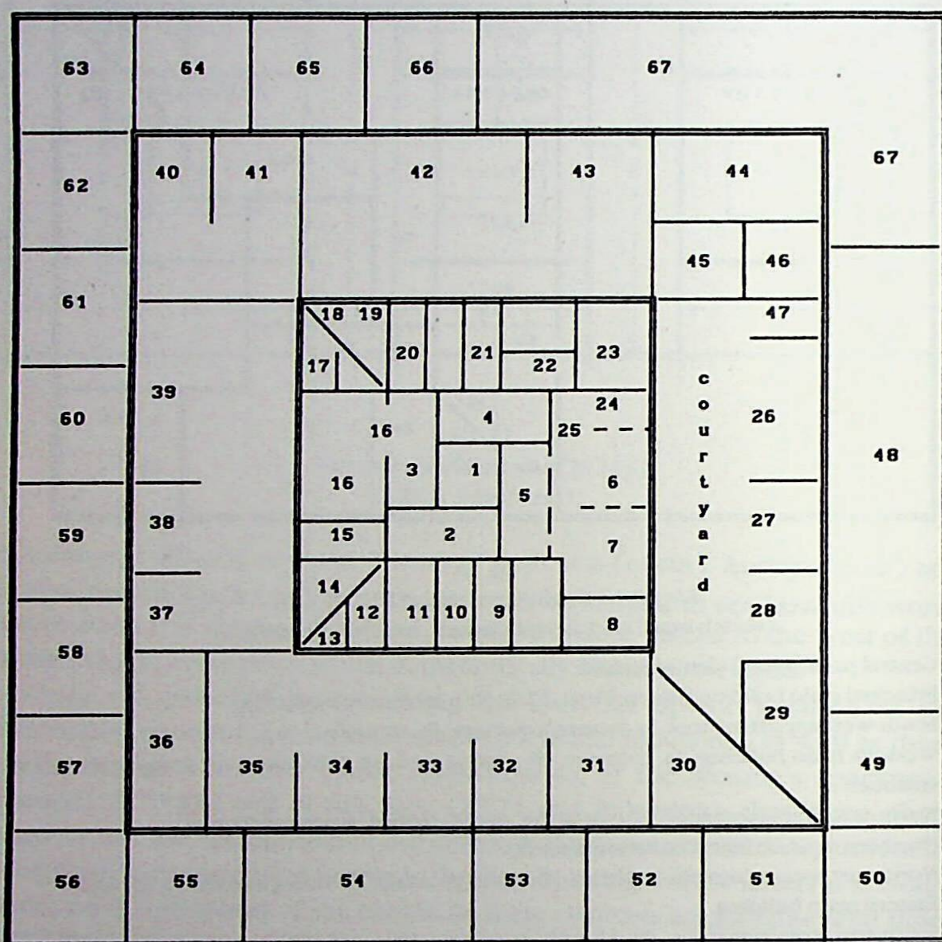


Fig. 34
Palace with three enclosures (29.12 sq.)

1st enclosure:

1. Central pavilion and altar of Brahmā; 2. king's dwelling; 3. theatre; 4. queen's dwelling; 5. entrance building; 6. courtyard; 7. vṛtta (bull stable ?); 8. store (gold for honoraria); 9. entrance building and guard; 10. dance hall; 11. stable; 12. confinement house; 13. reception pavilion; 14. ablution room; 15. store (salt and spices); 16. saṅkarālaya: 17. residential quarters; 18. lodgings (nurses, chambermaids); 19. lodgings (young girls); 20. infirmary; 21. lodgings (masseuses); 22. baths and water reserve; 23. shrine; 24. dining room; 25. reception hall.

2nd enclosure:

26. store (parasols and musical instruments); 27. almsroom; 28. 'water of charity'; 29. grinding stone and fuel; 30. stable; 31. gateway and armoury; 32. kitchen; 33. or 34. commander-

where the *saubala* palace is concerned (29.108 and following; for 35), the names of diagrams corresponding to the different enclosures are not indicated, and it is difficult to be precise about the position of a given building, especially when its relationship to a specific enclosure is not indicated; this is particularly regrettable in that the palace, for which these indications are given with the most exactitude, is just that one which is most cursorily described in its other aspects (fig. 34). These reservations having been made, it is to be emphasized that a certain number of common points can be found in the different arrangements suggested: especially noted will be the position of the *iṣṭadevatā* in the north-east corner of one of the enclosures; the installation, in the same area, of various hydraulic devices is obviously to be taken in conjunction with the fact that *Āpa* and *Āpavatsa* rule over a part of the north-east sector of the diagram. Where the area reserved for women is concerned it is to be noted that the main apartments of the queen (situated in the first enclosure) are usually to the south or north and that the greater part of the other female members of the royal entourage are placed to the west, where is located, especially, the *saṅkarālaya* (see 29.35b-37a). The abundance of every kind of storeroom will be noted: things are no different for a palace than for a fort (see 10.46 and following); a palace, like a fort, is to be provided with defences (see especially 29.158 and following); the walls of the interior enclosures sometimes have moats like that of the outer one (29.87 and following); it is possible that no defensive measures are envisaged but that these moats are simply intended to furnish a supply of water.

The position of the palace within a town varies according to the status of the sovereign who lives there and it is only when it is for an emperor (*viśvanṛpai-śvara*) that it occupies the central part of the town (29.1-3) (see as well 10.71 and following). The town is to be fortified (29.70-72) and its essential function is the sheltering of the royal army (29.65-66 and 161). The city which contains a royal palace is called by different names, according to the circumstances under which it was founded: it may, by that token, be a capital (*sthānīya*), a

in-chief's dwelling; 35. lodgings (fakirs, conjurors); 36. stable (buffaloes); 37. almsroom; 38. reception hall; 39. baths; 40. tank; 41. lodgings (young girls, wet nurses; 42. lodgings (artists); 43. lodgings (hunchbacks, dwarfs, barren women); 44. lodgings (nurses); 45. well, tank and flower garden; 46. honoraria room; 47. almsroom.

3rd enclosure:

48. schools; 49. main kitchen; 50. stable (cows and calves); 51. store (salt); 52. stable (elephants); 53. painting gallery; 54. store (condiments, etc.); 55. store (fuel); 56. store (alms); 57. lodgings (wrestlers); 58. lodging; 59. dwellings (crown prince and *purohit*), stables (horses, elephants); 60. indraśālā (assembly house?); 61. deer shed; 62. donkey and camel shed; 63. reservoir, lotus pool; 64. stable (horses); 65. stable (elephants); 66. building for initiation and confinements; 67. gardens, tank, assembly-hall, etc.

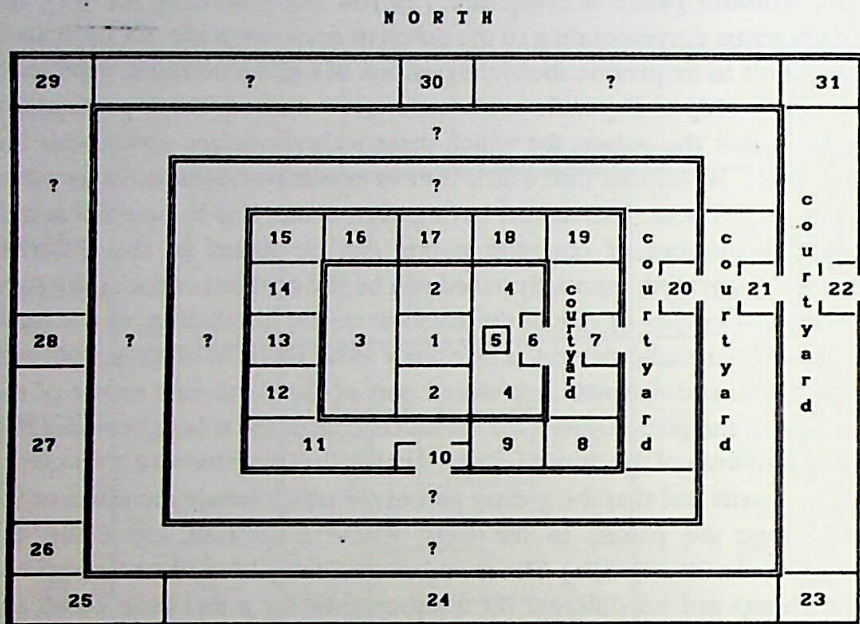


Fig. 35
Saubala palace (29.108 sq.)

1st enclosure:

1. central pavilion and altar of Brahmā 2. queen's apartments 3. king's apartments 4. courtyard 5. coronation pavilion 6. gateway.

2nd enclosure:

7. gateway 8. kitchen 9. treasury 10. gateway 11. women's lodgings 12. theatre 13. king's lodgings 14. purdah room 15. tank for water sports 16. queen's lodgings 17. places for tulābhara and hemagarbha ceremonies 18. stores (gold, jewels, perfumes) and elephants' stables 19. tank, latrines and hydraulic machine.

3rd enclosure:

20. gateway.

4th enclosure:

21. gateway (?).

5th enclosure:

22. main gateway and Durgā temple 23. offices and main kitchen 24. exercise place 25. king's dwellings 26. annexes 27. women's house 28. saṅkarālaya 29. tank, garden and hermitage 30. places for tulābhara and hemagarbha ceremonies 31. Śiva's temple.

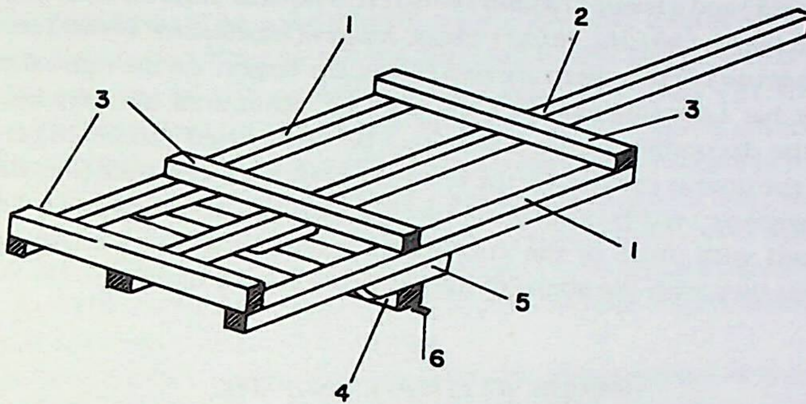


Fig. 36
Simplified drawing of a chariot frame (31.29 sq.)

1. long beam (bhāra); 2. pole (kūbara) and main long beam (madhyabhāra); 3. crosspieces (kampa); 4. crossbeam holding the axle (akṣottara); 5. longbeam support (bhāropadhāna); 6. axle (akṣa).

fortified town (*ābuta/agama*), an entrenched camp (*sangrāma*) or a town founded to commemorate a victory, most probably on newly conquered territory (*vijaya*) (29.162 and following).

Very few elements of the palace are described in any detail and it is surprising to find no description of the royal apartments nor of devices intended to safeguard the person of the sovereign. The elephant and horse stables are dealt with (29.168 and following), the latter being a *catuśśāla* whose main buildings may possibly be separate. Some other structures described are more typical of a royal dwelling: there is the council chamber, most likely installed in the king's apartments, there is an edifice which is probably meant for the queen's dressing room and there are, in particular, the places for the ceremonies of consecration, of the ritual weighing and of the gold embryo, but, except for these two last, descriptions are very brief.

Doors

The most interesting part of Chapter 30 (*dvāravidbāna*) is given over to the description of the different parts of the door (30.11-32); otherwise, the chapter deals with dimensions, with the position and with the character, either auspicious or inauspicious, of the doors (ibid. 33-52) and describes different types of gateway (30.53 sq.); as far as these last are concerned, the descriptions given in Chapter 24 (*gopuravidbāna*) are merely repeated and modified slightly. The frame of the door comprises two jambs (*yoga*), an elevated sill (*gulpba*), a

lintel (*vimalā*) and a frame (*vājana*) which acts both as lintel and sill. There are one or two leaves (*kavāṭa, talpa*) whose hinges (*hastihasta*? *vetra*?) turn in a socket (*bhājana*). When there are two leaves, the largest, on the right, supports the rabbet bar (*skandhapaṭṭikā*) and may be penetrated by a wicket door (*āvāra*); the decoration of the leaves may be very varied (30.26-28) and the closing of the door is effected by the horizontal bolts placed inside (*argala*) and outside (*kṣepaṇa*) and by a vertical one (*indrakīla*). The dimensions of a door must accord with those of the corresponding storey of the building and its proportions vary with the status of the occupant of that building.

IV

VEHICLES, SEATS AND ICONGRAPHY

The third section is the most heterogeneous; it juxtaposes two short chapters on the last two *vastu*, vehicles and seats, with others which are much longer and which deal with the *Liṅga*, the pedestals, the renovation work and the images.[35]

Vehicles

Vehicles which are to be carried (31.1-28) are the palanquins (*śibikā*) of which there are three types. The first type has the appearance of a pedestal, hence its name *pīṭhā* (or *paiṇḍikā*); it comprises a frame whose pieces (*īṣikā*) have handholds at their ends; above the framework rise latticed sides constituted by alternating slats (*kampa*) and planks; they are surmounted by a handrail (*hasta*) supported by bannisters. Since there is nothing said on the subject it must be assumed that the statues of the *utsavamūrti*, for which the vehicle is evidently intended, are to be placed on the plank floor at the level of the bannisters which support the handrail; the mention, however, of a door in the middle of the front wall of the palanquin allows for the supposition that, in some cases, these images may be placed inside the palanquin. The other two palanquin models have a roof supported by pillars, in such a way as to protect the images without masking them; this roof is in the shape of a *śikhara* (structure with rafters) or of a flat covering like that of a *maṇḍapa*.

Two types of wheeled vehicles are presented successively. The first is a chariot with two wheels to be used in a wide range of ways (31.48-49; see fig. 36). Its body (*hāra*) is supported by a frame, made up of an odd number of long beams (*bhāraka*) which are joined to each other by crossbeams (*kampa*) and which rest, through the intermediary of supports (*bhāropadhāna*, 'longbeam support') on a beam (*akṣottara*) upon which is fixed the axle (*akṣa*) whose

35. Chapters 35 and 36 are not found in all manuscripts and they are missing in Trivandrum and Tanjore editions; however they pertain to the work as is ascertained by their contents being listed in the first chapter (vv. 10-11).

spindles (*akṣāntara*) bear the wheels, which may have spokes or be solid. The pole (*kūbara*) is attached to the median long beams and its end is bent over. The dimensions of the temple chariot, next described (31.50 sq.), are calculated from those of the shrine; from the brief confused description it is possible to glean that there are three models; the superstructure of the first two has the appearance of a building with several storeys, which may, according to circumstances, be a pavilion (*maṇḍapa*), that is a three level edifice (base, pillars and entablature), or a temple (*prāsāda*) with six (see above); the third type is called 'canopy' (*raṅga*) and its superstructure would seem to consist only of pillars supporting a flat covering.

Chapter 32 which deals with beds and seats (*śayanāsana*) is very short and some of the information is repeated, with only slight variations, in the chapter on pedestals (*pīṭha*, chapter 34). Divans (*paryaṅka*) have a simple body whose pieces (*īṣikā*, *adhika*) have attached straps (*paṭṭa*) or a couch of planks; the legs may be straight or made in the shape of animals (32.7 sq.). The regular seats are called *pīṭha*, when square, and *āsana*, when rectangular, and are not distinguished from divans save by their much smaller dimensions (32.10 sq.); the only one where mention is made of a seat back (*uttara*) is the lion throne (*siṃhāsana*) which must stand on a base, which may itself be supported by a socle (32.13-18 and 34.54-56). The *Mayamata*, like parallel texts, includes amongst *śayanāsana*, the stand for domestic worship (*pūjāpīṭha*, 32.20-23).

Iconography

The god is shown in his shrine in the form of a 'sign' (*liṅga*) which may be 'manifest' (*sakala*, litt. 'complete'), 'umanifest' (*niṣkala*, 'incomplete') or 'manifest and unmanifest at once' (*miśra*, 'mixed') (33.1-3). The first expression is applied to images (*pratimā*, *bera*) which represent the god anthropomorphically, pseudo-anthropomorphically or theriomorphically, the description of which is the subject of Chapter 36. The term *niṣkala* applies to the god represented by a symbol which may be a part (*kalā*) of himself, like the phallus of Śiva, or may be his characteristic sign, such as the discus of Sudarśana-Cakra, Attendant of Viṣṇu. The third category, that of mixed representations, needs only be touched upon, since the sole example given here is the *Mukhaliṅga*, which is unmanifest by virtue of the Liṅga, which makes up its essential part, and manifest through the faces (or face) of Śiva carved on this Liṅga (36.107 sq.). However, *āyudhapuruṣas*' images may be considered as pertaining to the same category.

Chapter 33 extends itself on the subject of the making of *pauruṣalinga*, which may be defined as objects whose nature, as representation of Śiva, is not effective until the Liṅga has been sculpted and installed according to very strict rules which govern as well the materials, the shape, proportions, dimensions

and relationship between these dimensions and those of the sanctuary . . . etc. These *pauruṣaliṅga* may be contrasted with *daivaliṅga* ('divine' or 'natural Liṅga') whose value derives from their origin, the outstanding quality of their appearance or from some other singularity which is not to be submitted to any modification nor elaboration (33.90); the best known amongst the *daivaliṅga* are 'self generated' Liṅga (*svayambhuliṅga*) (33.87 and following) but the *bāṇaliṅga* is put into the same category (33.158-59) as well as some *pauruṣaliṅga* which don't conform to the rules (33.88) or which have reappeared after having been lost for an unknown length of time (35.52).

The *pauruṣaliṅga* may be divided into two major categories, that of *Liṅga* made of ordinary stones and that of those made with other materials (precious-stones, earth, wood, metal, 33.153). Those of the second category are less elaborate; it is to be noted, especially, that the presence of 'characteristic lines' (*lakṣaṇa*) is not obligatory (33.150-151) and, too, that the triple nature of the Liṅga (Śiva, Viṣṇu, Brahmā), is not necessarily put into form through a triple section (circular, octagonal and square) because it is sufficient if it is mentally recognized by the faithful (33.156 and following). Stone Liṇgas are classified according to various criteria which are: the dimensions (33.48 sq.), the relationship between these dimensions and those of the sanctuary (33.40 sq.), the proportions of the three elements, which may be equal or unequal, in which latter case that of Śiva is always the largest (33.72 sq.) and, lastly, the shape of the uppermost element (*śivabhāga, pūjabhāga*) which may be circular or may be polygonal (*dhārāliṅga*) or polygonal and covered with images of Liṅga (*sāhasraliṅga*) (33.82 sq.). The four stages in the making of a Liṅga are as follows: choice and extraction of the stone (33.4-36), cutting the block and putting in the three sections (33.65-71), shaping of the rounded summit (33.92-100) and lastly, the bringing out of the characteristic lines (33.101-42), which operation corresponds to the opening of the eyes of images (18.185 and following) and is to be done at the time when the Liṅga is installed in the sanctuary; these stages are described in detail, and, with respect to the first, the text gives specifications about the different sorts of stone; these specifications go to complete the teachings on materials in the rest of the work.

Theoretically, a pedestal must be made out of the same material as the representation that is to stand on it, but this rule is subject to alteration (34.2-3); if it is in stone it must be monolithic as far as is possible (34.40b-41). Its dimensions are proportionate to those of the sanctuary and those of the image or symbol (34.4 sq., 51 sq., 56 sq.); square or rectangular forms are suited to the pedestals of unmanifest images and elongated ones to images (34.10 sq.), and the pedestals invariably have mouldings (34.16-29); their upper face appears as a depressed area bordered by a rim (*snehavāri*) with a spout

(*praṇoīla, nāla*). (see chapter 34, note 7). The mortice meant for the tenon of image, or for the two lower elements of the Linga, is in the centre of the pedestal and the fixing is done with mortar (34.64). The pedestal rests on liners (34.44 sq.) and its position varies according to which deity it supports (34.67; 33.37).

Chapter 35 (*anukarmavidhi*, lit. 'rules for the final work') deals with two very different subjects, the operations involved in the renovation, in the first place, and the rite of provisional installation in the second. The principle guiding all renovation is simple: the operation must, at the very least, try for a return to the original state but, if possible, there must be an improvement which may mean an extension as much as the use of better quality materials (35.40 sq.). There is a great deal of information on Liṅga in this regard (35.15 sq.) and the idea of renovation encompasses, as well, the purifications after pollution and the rectifications where there have been errors made in making or installing. The rite of foundation should not be repeated in the case of buildings (35.14), a prescription that is similar to the one advising against the placing of the foundation deposit when the mistress of the house is pregnant (12.95): the foundation is an insemination and there cannot be two at the same time neither two for the same 'product'.

The provisional installation (35.48 sq.) furnishes a substitute when the shrine or the divine representation which it houses is not able to be used in worship due to specific conditions; during the work of construction of the sanctuary or during the making of an image or a Liṅga or when they have to be renewed;[36] this provisional installation is used as much for moveable images (*utsavamūrti*) as for fixed images placed in a sanctum (35.55). The substitutes may be smaller versions of what they stand for (hence the name *bālasthāpana*) and they must not be in use for more than twelve years, one way to limit the duration of construction or renovation work (35.58).

Chapter 36 deals with images but has very little to say about their making: there is no mention of the materials (but see 33.10-12), the dimensions are only presented in a very general way and the specific proportions are virtually never given (see however 36.69 and 33.107-31). More or less succinct descriptions are found in this chapter: general appearance, posture, attributes, decoration and colours, sometimes with the indication of the reward that is to be hoped for as a result of installing the image. There is no point in looking for any originality in these descriptions which, for the most part, appear, almost word for word, in the parallel texts such as the *Kāraṇāgama*. It is perhaps in this area that we can

36. Provisional installation has not been mentioned in the chapters dealing with preliminary works of construction; it is most probably due to the fact that such installation is specific to temples, while those chapters were concerned with rules applying to all dwellings — human or divine.

most clearly see the intensive mixing to which the āgamic texts were submitted at the time when they were evolving into the versions we now have: their last compilators would have had no hesitation in taking, from the common fund, the developments whose presence was expected. In addition, the lack of originality and precision in the text is shown by the use of certain all-purpose formulae which are not distinguishable as to whether they are genuine elements or simply prosodical padding; thus, *sarvābharaṇasaṃyuktam* (1st or 3rd *pāda* of *anuṣṭubh) or sarvābharaṇasaṃyutam* (2nd and 4th *pāda*).

The deities described are those to be installed in the various temples and shrines (see Chapter 23 passim) and on the facades of these edifices (19.39 sq.). As in the rest of the work, Śaivism is prominent; in fact, on the Vaiṣṇavite side, apart from Viṣṇu as Attendant of Śiva (36.8-12), only Narasiṃha and Anantaśāyin merit any developed description (36.15 sq.). On the other side, sixteen manifestations of Śiva are presented (36.43 and following) including the *Mukhaliṅga*, which, in other texts, is usually described separately. Amongst secondary deities, important places are given to Sūrya, Kṣetrapāla (or Bhairava), Śāstā and the Seven Mothers whose description is followed by a note on their installation and on certain variations in their positions (36.211 sq.). It may be found surprising that Vṛṣa, Śiva's chief Attendant, does not appear but this image has been presented in detail at the end of the lists of *parivāra* (23.107-31); Buddha and Jina whose shrines are mentioned in Chapters 9 and 12 are the subjects of descriptions which reveal how limited was the knowledge about their sects (36.281 sq.). The amount of importance given to Jina is probably explained by the relative prominence of the Jain community. Lastly, a number of deities, or series of deities, present problems, for instance the *eight* Marut (36.173b), the *seven* Rohiṇī (36.194b) or *Yakṣiṇī* (36.256 sq.) and Saptamātā (36.279-280).

We have regrouped in an Appendix some information related to wells which had been subject to haphazard interpolations in Chapter 36.

V

THEORY AND PRACTICE

The *Mayamata* is just what might be considered a revealed text, it was expressed by Maya, the divine architect, even if of the Asura. Maya, however, introduces himself as a mere intermediary who faithfully transmits the answers of the gods to his own querries (1.1-2 and 15). When he refers to authorities these are the Sages, keepers of divine knowledge, or are the *Tantra*, that is to say, the *āgama* revealed by Śiva to various intercessors. Being revealed, the *Mayamata* makes no reference to any prior construction or image from which

it might have extrapolated the theory it presents. It is immediately apparent that this method differs from that of Vitruvius who had no hesitation in theorizing from actual and precise examples, thus substituting for the irrefutable, but abstract, authority of revelation that of a more concrete antiquity.[37]

That being so, the *Mayamata* is dated, even if approximately, and its theory of architecture has been extrapolated from existing monuments belonging to an easily identifiable school. To the end of developing the theory, these monuments have been carefully analysed and reduced to subsets and then to more or less simple elements which are, nevertheless, simple enough to be able to be combined in a very wide range of compositions. Each of the elements thus separated out is described, according to the single or multiple shapes that it may assume. At the same time a norm is established, governing the conditions of the general use of the given element or those of each of its specific types; these may be defined either by their appearance or by their dimensions or, most often, by both series of factors combined. In the same way a norm is defined for each subset, (itself defined by its constituting elements), and so on. These norms of usage will be considered again but, meanwhile, it is to be emphasized that they answer to greatly diverse constraints which are by no means all to do with technique. To return to the architectural analysis which is the essential step in the elaboration of the theory, the stages of its development remain obscure but it may be assumed that it was constituted progressively, following the elaboration of more and more complex forms and, at the same time, of the vocabulary which allows these forms to be designated as well as described.

It is obvious that, at the time of drafting of the *Mayamata*, the typological lexicon and the semantic one were both fixed and, for the most part, perfectly adapted to the analysis of those monuments whose construction the text purports to govern. It is significant moreover, that this vocabulary is sufficiently precise and sufficiently flexible to be of use in the synchronic description of all the monuments pertaining to the school, from those built right up to the present day in India south of the Krishna, to those found in the Indianized kingdoms of South East Asia, to say nothing of such singular phenomenon as the temple 'built according to the *āgama*' some years ago in Pittsburgh (U.S.A.). This last reference which justifies the pretension to universality held by the text, pinpoints a weakness in the analysis which has less to do with the internal structures of edifices than with their outward appearance, since that may be nothing but a decoration plated onto a structure to which it corresponds only very approximately, if at all.

37. P.K. Acharya seems to have overlooked this point in his far fetched attempt to relate Vitruvius and *Mānasāra* (*Indian Architecture according to Mānasāra-Śilpaśāstra*, 1934, pp. 134 and foll.).

Systematic presentations of the results of the analysis are found only with regard to the elevation; its major elements, obligatory or optional depending upon the type of edifice, are described separately one after the other, the full range of possible forms being given for each. The procedure is different when it comes to the plan; it starts with the simplest one for each category of edifice which it then uses as a basis for the more complex compositions. Additional elements are introduced progressively in conjunction with the occurrences of the more and more complex types into which they are integrated.

Dimensions and, more than that, proportions occupy a very important place in the presentation of the analysis; one must not forget that the root MĀ means at the same time 'to measure' and 'to build'.[38] The indications of all the possible dimensions, for a given type, allow for a multiplicity of variations and for the duplication of the specifically typological classification by another, pertaining to size; moreover, the procedure allows for the encompassing, by the theory itself, of all its potential and authorized applications.

The systematic usage of proportions strongly indicates that the analysis leads to a modular conception of architecture. Two procedures are followed: the first consists in the employment of units which we will call 'occasional', to divide, for example, the height of a given edifice into *N* parts of which *n* are for the base, *n*' for the level of pillars . . . etc. Besides that there are conventional units set for a whole building and which play the role of modules. Thus, there is the module itself (*daṇḍa*) which is, as mentioned, the diameter of the top of a pillar and which is often used as general reference unit for indicating the value of projections of mouldings or of foreparts. The intercolumniation (*bhakti*) falls into the same category and is for calculating horizontal proportions of hypostyle edifices or pseudo-hypostyle ones. On a more far reaching basis, the width of the main temple is used as a reference unit for calculating the size of the enclosures of the temples. To the use of these various units is added the constant mention of fractional relationship between the different dimensions of an element (door, pillars etc. . . .) or of a complex assembly (building, settlement . . .).

To sum up then, all the parts, even the smallest of an assembly, however large it may be, are ultimately connected to one another by an intersecting pattern of different systems of proportions and of modular relationship. This aspect of the analysis goes beyond the architecture since, in temples, the images themselves are integrated into the general system of proportions for which they are even, sometimes, taken as departure point, when the dimensions of a shrine are set according to those of the divine representation it is intended to house.

38. See *Kalātattvakośa: a Lexicon of Fundamental Concepts of the Indian Arts'* - Vol. II: *Concepts of Space and Time* (New Delhi 1992), pp. 355 and following.

The analysis of the elevation rests on the postulate that, since the temple (*prāsāda*) is the most perfect of edifices, its elevation will necessarily comprise all the elements that are to be found in the elevation of any other category of building, that is to say, the analysis of the elevation of the temple gives the entire vocabulary of forms needed for the description of any elevation whatsoever. This explains why the detailed architectural descriptions begin with that of the levels of elevation of the *prāsāda*, taken one by one. The different categories of edifice being defined by the levels which are comprised in their elevation, their detailed descriptions can then be limited to their specific plans.

The definition of levels gives rise to a general point: the terms employed to designate these levels are the names of the structural elements to which they correspond. This point underlines the fact that the vocabulary used in the analysis has been established on the basis of an architecture whose elements were all structural, and before they had developed into decoration having little or nothing to do with the structure it clothed. It is to be noted that the ambiguity of the vocabulary allows for the descriptions to be applied, as well to that which is no more than a decoration, in the case of temple elevations, as to what is a genuinely structural elevation, in the case of pavilions or houses.

The analysis of plans is given, together with the definitions of the various categories of building, that is: temples (*prāsāda*), gateways (*gopura*), pavilions (*maṇḍapa*), halls (*sabhā*) and houses (*śālā*), to mention only the most important. The temple may be defined as an edifice whose elevation comprises all the six levels and whose plan, in its most simple form, comprises only one room, the sanctum; this basic layout is subject to series of variations in plan as well as in elevation; the edifice may be square, rectangular, apsidal . . . etc. and the exterior, as drawn, may not correspond to the interior drawing of the sanctum, which may be circular in a square edifice, square in an apsidal one . . . etc. Moreover, there may be variations of plan at the different levels, that is to say, a building may have an octagonal or circular superstructure on a square lower part, to give but one example. The variations of the elevation essentially depend upon the number of storeys, that is, on the repetition, or the lack of it, of the pair constituted by the level of the pillars and the entablature and show, as well, in the number and arrangement of aediculae and dwarf-galleries on the entablature. Developed from the basis of the same elementary, one room plan, is another series of variations marked by foreparts or porches built against the facades of the ground floor. The most complex types are extrapolated from the simple layout by concentric additions or by the juxtaposition of the temple proper to a pavilion; both procedures are often used in one and the same edifice. The concentric additions are obtained by the insertion, between the sanctum and the outside of the building, of one or several aisles (*alindra*)

separated from each other and from the sanctum by plain walls; the larger plan thus obtained is itself subject to all the elementary type's variations. The extrapolation by juxtaposition entails a pavilion's being added to the entrance of the sanctum; the link between temple and pavilion is made by means of a covered passage (*antarāla*) which is none other than the porch transformed into a corridor; the pavilion conforms to the typological definitions of pavilions, but its proportions are related to those of the temple proper.

The example given for temples applies equally to other categories of building (see for example, above, apropos private houses). The architectural analysis definitively furnishes a catalogue of simple and complex forms which may be used in the context of norms, which are precisely regulated by various constraints amongst which technique is the most often inextricably tied up with the social and religious factors, to the point where it becomes difficult to tell which part belongs to which of these fields.

In the social sphere there is, first, the absolute need to conform to the established order in transposing, onto the architectural plan and the built up space, the hierarchy founded upon the *varṇa* and the *jāti*, as much as that deriving from wealth. In the former case there is, a naturally and first of all, the organization of the space in such a way that each category has the place suitable for it; but that hierarchy also has to be considered when reserving to (gods and) upper classes, the perfect forms, the greatest dimensions and the best materials, usually bestowing upon them the freedom to use the inferior ones without thereby departing from custom; thus the square sites are reserved for gods and brahmins but they may both use the rectangular site of other classes, increasingly elongated as one goes down the social scale (cf. Chapters 2 and 3). Similar prescriptions are given for dimensions and materials. In the hierarchy based upon wealth, the most important thing is to avoid disproportion and mediocrity, that is, to confine oneself to the realm of the possible: thus the number of brahmins to be installed in a village may be as small as one, if there is no alternative (9.25 sq.). Elsewhere it is riches by which certain members of lower classes can be distinguished; a house meant for the well-to-do amongst *śūdra* (27.125) is referred to, whose description follows directly upon that of another house meant for the powerful amongst *vaiśya* (27.119). This type of hierarchy is connected with the political one established amongst the various 'kings', (that is, *kṣatriya*) whether with regard to types of town (Chapter 10), or to the arrangement of the palace (Chapter 29).

Constraints of the religious kind are very diverse and often hard to determine. First to be remembered are those to do with the position of the gods at the top of the social hierarchy and which are nothing but extensions of the constraints already discussed. In the same range of ideas are those pertaining to divine

hierarchies, as for example, the organization of the space, the situating of temples, their dimensions and their specific aspects (see, especially, Chapter 9); it is worth recalling here the remarks of Ram Raz on the place given to Buddha and to Jina. There are other exigencies arising out of the necessary relationship between the dimensions of a divine representation, whether *Liṅga* or image, and those of the building which houses it. Lastly, to be included in the religious domain, for want of a more precise alternative, are all the imperative linked, not only with the ritual but also, in more general fashion, with everything that can be placed under the heading of 'signs'.

Ritual is essential to the success of the construction it accompanies: the ploughing and purification of the place, the putting to flight of deities previously established there and of those of the trees and stones that are going to be used, the installation on the diagram of the protective deities of the site; the recognition of the body of the spirit of the site and the putting in place of the foundation deposit marking the start of the work of construction. There are no particular ritual procedures during the course of the construction itself but special precautions have to be taken in respect of the vulnerable points (*marma*) of the spirit of the site. At the end of the construction work, fresh ceremonies of consecration of the building and for the installation of its occupants, whether human or divine, assure them, in either case, of a happy life and mark the end of the work and of the architect's responsibility. There are, as well, innumerable constraints connected with 'signs'; the rules relating to choice of site or of materials, for example, clearly show that empirical technique is mixed with divination. In other areas there are speculations relative to the 'gender' of materials and of buildings and to the correspondence, necessary but not always evident, between type and usage. Lastly, there are speculations on more or less auspicious numbers, dealing with the distinguishing of odd and even ones or with the determining, through a complex system of relationships, of whether the dimensions are beneficient and whether they accord with the horoscope of the proprietor or that of the settlement (*āyādi*).

The *Mayamata* confers on the architect the task of putting into practice what it prescribes. In spite of the constraints by which the treatise seems to limit the architecture, it is also true that the architect has considerable latitude at his disposal, as much in the domain of choice or architectural parts as in that of the appearance that constructions may have.

This freedom comes, in the first case, paradoxically enough, from the pretensions of the treatise to universality. The text, seeking to encompass all possible circumstances, envisages them, and prepares for them by means of an extended series of specific variations; such being the procedure, it is left to the

architect to choose this or that option 'according to circumstances' (*yuktyā*) as is often repeated. Equally the treatise has its limitations which also leave the excuṭant a certain leeway. The first are those of the analysis itself which is not, on the one hand, as precise as it could be and which, on the other, contains, in the area of expression, ambiguities such as those involving the doucine or the recessed elements.[39] The other limitation is imposed by the written form;. descriptive prescriptions are often little other than written transcriptions of graphic representations. From another point of view, the architect who 'knows how to draw' (*citrajña* 5.17) must read and draw simultaneously; this is evident from, for example, the way in which the description of the socle *pratibhadra* is 'written'; a literal translation follows (13.12-13a):

> With two, one, two and one parts, as well as with two, one, eight, one and one parts and with three parts and one and two, one and two parts are for arrangement of plinth, doucine, fillet and groove, string-course and above a fillet, the dado and above a fillet and a doucine, the cornice, a fillet, a string-course and fillet.

It is clear that the list of dimensions, followed by that of the mouldings to which they belong, is not intelligible unless this description is 'rewritten'. This rewriting may be a simple gloss but, for a specialist with the responsibility of imposing upon an edifice the form thus described, it is obvious that a drawing made from the reading will be the most appropriate and the most cogent.[40] By the same token, the plans cannot easily be read unless they are transposed to drawings, which the use of regular pattern makes simple. In the realm of elevation the manner of description is curious when, for example, only the proportions of the ground floor are given for a temple of seven storeys, along with indication that it is to be under the bottom of a temple with six storeys; this makes it obvious that the written description is but a written transposition of a drawing and may call for retransposition. In another area, that of iconography, the descriptions, made up of lists of limbs or part of limbs and of proportions, are not intelligible unless the different elements mentioned therein are put together in a drawing.[41]

This necessity, which is due to the nature of the text itself and of its subject, allows the specialist to give an interpretation, whether it be personal or guided by the fashions of the time and place. The monuments, which pertain more or

39. See Dagens 1984, p. 39.
40. I do remember that when in the late sixties I went to meet Tiru V. Ganapati Sthapati at Mahabalipuram, he answered to some of my queries about difficult passages of *Mayamata* by the way of rough sketches made up on the spot and giving his own 'translation'of the text.
41. On that point, it is surprising to note that very few manuscripts of *vastuśāstra* (or the like) are illustrated by drawings, if any (with the exception of the manuscript of *Śilpaprakāśa* used by the editors of that treatise).

less to the architectural school the *Mayamata* represents, cover a period of fifteen centuries and an area which encompasses a large part of the Indian peninsula as well as of South East Asia. This phenomenon is only possible because, in spite of their doctrinaire character, this treatise and others of the same group, leave to architects the right to originality in the exercise of their art; in other words, the tradition is a guide more than it is a restraint.

MAYAMATA

Treatise of Housing, Architecture and Iconography

Sanskrit text edited and translated
by
Bruno Dagens

प्रथमोऽध्यायः

[संग्रहाध्यायः]

प्रणम्य शिरसा देवं सर्वज्ञं जगदीश्वरम् ।
[1]तं पृष्ट्वास्मादलं श्रुत्वा शास्ति शास्त्रं यथाक्रमम् ॥ १ ॥
तैतिलानां मनुष्याणां वस्त्वादीनां[2] सुखोदयम् ।
प्राज्ञो मुनिर्मयः कर्ता सर्वेषां वस्तुलक्षणम्[3] ॥ २ ॥
आदौ वस्तुप्रकारं च भूपरीक्षापरिग्रहम्[4] ।
मानोपकरणं चैव शङ्कुस्थापनमार्गकम्[5] ॥ ३ ॥
[6]सपदं सुरविन्यासं[7] बलिकर्मविधिं तथा[8] ।
ग्रामादीनां च विन्यासं लक्षणं नगरादिषु[9] ॥ ४ ॥
भूलम्बस्य विधानं च गर्भविन्यासलक्षणम् ।
उपपीठविधिं चैवाधिष्ठानानां तु लक्षणम् ॥ ५ ॥
स्तम्भानां लक्षणं चैव प्रस्तारस्य[10] विधिक्रमम् ।
सन्धिकर्मविधानं च शिखराणां तु लक्षणम् ॥ ६ ॥
एकभूमिविधानं च द्वितलस्य तु लक्षणम् ।
त्रितलस्य विधानं च चतुर्भूम्यादिलक्षणम् ॥ ७ ॥
ससालं[11] परिवाराणां गोपुराणां तु लक्षणम् ।
मण्डपादिविधिं चैव शालानां चैव[12] लक्षणम् ॥ ८ ॥

1. E : तं दृष्ट्वास्मादलं श्रुत्वा वास्तुशास्त्रं यथाक्रमम् ।
2. D : वास्त्वादीनां
3. D : वास्तुक्रमणाम् ; E : वास्तुकर्मणम्; F : वस्तुकर्मणम्
4. C : भूपरीक्षां परिग्रहम्
5. F : शङ्कुरस्थालेवस्तु परमार्गकम्
6. F : सुपदं
7. A, B, C : स्वरविन्यासं
8. E : बलिकर्म विध्यते
9. C : नरदादिषु
10. A (var), C, D, E, F : प्रस्तरस्य
11. A : ससारं
12. D : शालादीनाञ्च

Chapter 1

SUMMARY

1-2 Having bowed his head before the omniscient God, Lord of the Universe, having questioned Him and having listened exclusively to Him, Maya, wise and learned architect,[1] proclaims this systematic treatise which is the basis of success for every kind of dwelling intended for gods and men and which contains the characteristics of dwelling for all.

3-11 First (he ordains) the shapes of dwelling sites and the method of examining and taking possession of them. Then he gives the system of measurements[2] and the method for installing the gnomon. Next (come) the diagrams, the arrangement of the gods (on these last) and the rules relating to offerings. Next (he prescribes) plans for villages and similar settlements as well as the specific characteristics to be found in towns and cities. Then come the rules relating to the number and dimensions of storeys and next the features and arrangement of foundation deposits.[3] Next are given the rules applying to socles, the specific characteristics of bases and pillars, as well as prescriptions for entablatures.[4] Next come the rules for joinery, the characteristics of roofs[5] and the characteristics of temples with only one storey, with two storeys, with three storeys, with four storeys . . . etc.[6] Next the

1. *Kartṛ*: 'architect' or 'author (of the treatise)'.
2. Chapter 5 which deals with measurements also contains an eulogy of the architect (*sthapati*) and of his assistants.
3. Chapter 12 : foundation's deposits are also dealt with at the end of chapter 9.
4. Besides the description of entablature chapter 16 also contains notes about windows and walls.
5. In chapter 18 (rules relating to roofs) are also given prescriptions about mortars and coatings as well as a long description of the ceremony which marks the completion of the building.
6. Chapters 19 to 22: there are also found scattered notes about decorative elements (chapters

गृहविन्यासमार्गं च गृहवेशनमेव च[13] ।
राजवेश्मविधानं च द्वारविन्यासलक्षणम् ॥ ९ ॥
यानानां शयनानां च लक्षणं लिङ्गलक्षणम् ।
पीठस्य लक्षणं सम्यगनुकर्मविधिं तथा ॥ १० ॥
[14]प्रतिमालक्षणं देवदेवीनां मानलक्षणम् ।
चक्षुरुन्मीलनं चैव संक्षिप्याह[15] यथाक्रमम् ॥ ११ ॥
पितामहाद्यैरमरैर्मुनीश्वरै-
र्यथा यथोक्तं सकलं मयेन तत् ।
तथा तथोक्तं सुधियां दिवौकसां
नृणां च युक्त्याखिलवस्तुलक्षणम्[16] ॥ १२ ॥

इति मयमते वस्तुशास्त्रे संग्रहाध्यायः
प्रथमः

13. D : गृहप्रवेशनमेव च
14. D : देवानां माननिश्चित्य देवीनां मानलक्षणम्
15. A (var) : संक्षिप्यैव ; D : संक्षिप्याहि
16. A (var) : वास्तुलक्षणम्

characteristics of attendant deities shrines are given along with those of enclosure walls and gateways. Next come the rules relating to pavilions and like buildings,[7] the characteristics of (houses with one or more) main buildings as well as the disposition of houses and the (ceremony of first) entry into a house.[8] Next are given the rules relating to kings' palaces as well as the characteristics of doors and their arrangement.[9] Next come the specific characteristics of conveyances and of seats as those of Liṅga and pedestals. Next the rules pertaining to repairs are given as well as the particulars and proportions of the images of gods and goddesses; lastly the ritual of the opening of the eyes is indicated.[10] All this is summarized and presented systematically.

12 All this has been ordained by the lords of the sages, the immortals, of whom the first is Pitāmaha. All this has been comprehensively set forth by Maya: that is, the characteristics of perfect dwellings according to whether they are intended for the pure spirited denizens of the heavens or for men.[11]

Thus ends, in the *Mayamata*, treatise on dwelling, the first chapter: SUMMARY.

21 and 22) and stairways (chapter 22).

7. That is to say halls (*sabbā*) which are described after the pavilions (*maṇḍapa*) in chapter 25.
8. That is to say *ekaśāla, dviśāḷa, triśāla, catuśśāla* . . . (chapter 26); arrangement of *catuśśāla* is dealt with in chapter 27 while the first-entrance ceremony is described in chapter 28.
9. For kings' palaces see chapter 29. After dealing with doors, chapter 30 gives a description of gateways which supplements that already given in the 24th chapter.
10. Repairs and images are dealt with in chapters 35 and 36, while *cakṣurunmīlana* ceremony is only alluded to in chapter 18 (v. 187).
11. *Vaṃṣasthavṛtta* metre.

अथ द्वितीयोऽध्यायः

[वस्तुप्रकारः]

अमर्त्याश्चैव मर्त्याश्च यत्र यत्र वसन्ति हि ।
तद् [1]वस्त्विति मतं तज्ज्ञैस्तद्भेदं च वदाम्यहम् ॥ १ ॥
भूमिप्रासादयानानि[2] शयनं च चतुर्विधम् ।
भूरेव मुख्यवस्तु[3] स्यात् तत्र जातानि यानि हि[4] ॥ २ ॥
[5]प्रासादादीनि [6]वास्तूनि [7]वस्तुत्वाद् वस्तुसंश्रयात्[8] ।
[9]वस्तून्येव हि तान्येव प्रोक्तान्यस्मिन्[10] पुरातनैः ॥ ३ ॥
वर्णगन्धरसाकारदिक्शब्दस्पर्शनैरपि ।
परीक्ष्यैवं यथायोग्यं [11]गृहीतावधि[12]निश्चिता ॥ ४ ॥
[13]या सा भूमिरिति ख्याता वर्णानां च विशेषतः ।
द्विविधं तत् समुद्दिष्टं गौणम[14]ङ्गीत्यनुक्रमात् ॥ ५ ॥
[15]ग्रामादीन्येव गौणानि भवन्त्यङ्गी मही मता[16] ।
[17]सभा शाला प्रपा रङ्गमण्डपं मन्दिरं तथा ॥ ६ ॥
[18]प्रासाद इति [19]विख्यातं शिबिका गिल्लिका रथम्[20] ।
[21]स्यन्दनं चैवमानीकं यानमित्युच्यते बुधैः ॥ ७ ॥

1. F : वस्त्विति मन्त्रज्ञैः तत्
2. A (var), D, E, F : यानं च
3. A (var), C : सर्वधारा
4. F : यानीह
5. E : प्रासादानि
6. B : वस्तूनि
7. A (var) : वस्तुत्वं; D : वस्तु स्यात्
8. A (var) : यस्तु संश्रयात्
9. F : वस्त्रान्येव
10. F : अस्मात्
11. A (var) : गृहीत्वा
12. F : निश्रिताम्
13. D : यासां भूमिविधिख्यातां वर्णानाञ्च विशेषता
14. D : आगम्य instead of अङ्गीत्य
15. D : ग्रामादन्येव
16. F : अङ्गिमहिततः
17. D : सभा शाला प्रभाङ्गं मण्टपं मन्दिरं तथा
F : सभा राला प्रभाङ्गं मन्दिरं मण्डपं तथा
18. C : प्रासादमिति
19. F : विख्यातशिवभागिल्किकरथम्
20. C : रिल्लिकारथम्; D : भिल्लिकान्यया
21. D : स्यदनं चैव तं प्रोक्तं एवमुच्यन्त्यते बुधैः

CHAPTER 2

DWELLING SITES[1]

1-3 Experts call all places where immortals and mortals dwell, "dwelling sites" (*vastu*). I present their different varieties which are four in number: Earth, temples,[2] conveyances and seats. The Earth is the principal dwelling place because it is on Her that constructed dwellings (*vāstu*) such as temples have appeared and it is because of Her nature as site and because of the (temples') union with (this site) that the ancients called them 'dwelling sites' in this world.

4-6a That chosen after a thorough examination of the colour, odour, flavour, form, orientation, sound and tactility,[3] that once delimited, is what is called the dwelling site; it is different for each class of men.[4] It is of two types, the one secondary and the other principal. Villages and the like are secondary but the Earth is the principal site.[5]

6b-8 Halls, houses, sheds and pavilions with inner court as well as palaces are called 'buildings' (*prāsāda*).[6] 'Conveyances', say the sages, are

1. In this chapter there is an opposition between *vastu* and *vāstu*, the first one being applied to dwelling sites and the second to proper dwellings. Thus being the case, the opposition does not appear elsewhere in *Mayamata* dwelling sites are designed as *vāstu* (e.g. 6.2, 7.54...) as well as *vastu* (7.31, 14.1, 15.54 . . .); both terms are used to designate dwellings or buildings (*vastu*: 15.121, 17.1, 19.9 . . .; *vāstu*: 14.11, 18.211 . . .) and both appear in the list of synonyms of *prāsāda* (19.11).
2. *Prāsāda* is often used as a generic term applied not only to temples but also to all kinds of buildings where gods or men may inhabit (see below vv. 6b-8).
3. See next chapter.
4. Or 'it is different according to the colour'. Both translations go back to the same for colour is amongst the criterions used to decide to which *varṇa* a site is suitable (see below vv. 10-15).
5. Settlements such as villages are secondary dwelling sites for, once chosen and delimited on the Earth they become a kind of microcosm where sites for temples and houses are to be delimited.
6. *Sabhā*: that kind of building with only one big room surrounded by one or two rows of pillars (25.198 sq.) may be used as shrine (e.g. the famous *sabhā* of Cidambaram) as well as a meeting place (e.g. for the village assembly, see below 25.237; also Kane III pp. 92-3, 276-7 . . .). *Śālā* may designate a house but is more often applied to the one or several main buildings which constitute such a house (see below chapter 26). *Prapā* is often applied in the classical literature to a shed where travellers may find water (cf. *Amarakośa* II.3.7: *prapā*

[22]मञ्चं मञ्चिलिका काष्ठं पञ्जरं फलकासनम् ।
पर्यङ्कं बालपर्यङ्कं शयनं चैवमादिकम् ॥ ८ ॥
[23]चतुर्णामधिकाराणां भूरेवादौ [24]प्रवक्ष्यते ।
[25]भूतानामादिभूतत्वादाधारत्वाज्जगत्स्थितेः ॥ ९ ॥
चतुरश्रं द्विजातीनां वस्तु [26]श्वेतमनिन्दितम् ।
उदुम्बरद्रुमोपेतमुत्तरप्रवणं [27]वरम् ॥ १० ॥
कषायमधुरं सम्यक् कथितं तत् सुखप्रदम् ।
[28]व्यासाष्टांशाधिकायामं [29]रक्तं तिक्तरसान्वितम् ॥ ११ ॥
प्राङ्निम्नं [30]तत् प्रविस्तीर्णमश्वत्थद्रुमसंयुतम् ।
प्रशस्तं [31]भूभृतां वस्तु सर्वसम्पत्करं सदा ॥ १२ ॥
[32]षडंशेनाधिकायामं पीतमम्लरसान्वितम् ।
प्लक्षद्रुमयुतं पूर्वावनतं शुभदं विशाम् ॥ १३ ॥
चतुरंशाधिकायामं वस्तु प्राक्प्रवणान्वितम् ।
[33]कृष्णं तत् कटुकरसं न्यग्रोधद्रुमसंयुतम् ॥ १४ ॥
प्रशस्तं शूद्रजातीनां धनधान्यसमृद्धिदम् ।
एवं [34]प्रोक्तो वस्तुभेदो द्विजानां
भूपानां [35]वै वैश्यकानां परेषाम् ।
योग्यं सर्वं भूसुराणां सुराणां
भूपानां तच्छेषयोरुक्तनीत्या ॥१५ $\frac{१}{२}$ ॥

इति मयमते वस्तुशास्त्रे वस्तुप्रकारो नाम
द्वितीयोऽध्यायः

22. A : (var) मञ्चमञ्चद्विका; C : मञ्चमञ्चयिका
23. D : omits 9.
24. A (var), C. : भूरेयाद्य ; F : भूरेवार्व
25. F : भूतानामादिभूदघाथातारत्वाज्जगस्थितैः
26. C : त्वेतदनिर्न्दितम्
27. D : परम्
28. D : व्यासाष्टाधिकमायामं; F : सासाष्टांशाधिकायमं
29. D : रक्ततिक्त
30. D : तु
31. C ; भूषितं
32. Order of verses 13 and 14 is reverse in F.
33. D : कृष्णाभं तत्कटुरसं
34. D : प्रोक्तं वस्तुभेदं
35. D : च

litters, palanquins, carriages, war chariots and *ānika*.[7] Lastly, designated as "seats" are thrones, divans, chairs, aviaries, benches, beds and cradles.

9 Of the four categories, however, it is the Earth which is said to occupy the first place since, for beings, it is she who was before all else and who is the support and the stability of the World.[8]

10-15a The site suitable for brahmins is square, white, without defects, planted with *udumbara* trees, sloping towards the north, perfect and has an astringent and sweet savour. Such a site is a guarantee of good fortune. The length of the site suitable for kings is one eighth more than its width; it is red in colour and bitter in flavour, it slopes towards the east, is vast and planted with *aśvattha*. Such a site invariably guarantees success. The length of the site suitable for vaiśya is one sixth more than its width; it is yellow, of sour taste and planted with *plakṣa*; it slopes towards the east. Such a site is beneficent. The length of the site suitable to śūdra is one fourth more than its width; it slopes towards the east, is black, has a pungent flavour and is planted with *nyagrodha*. Such a site is a source of abundant riches and grain.

15b These are the different types of sites suitable for brahmins, kings, vaiśyas and others. They are all equally suitable for the gods on earth, the gods and the kings, but for the two other classes the aforementioned rules are to be applied.[9]

Thus ends, in the *Mayamata*, treatise on dwelling,
the second chapter: SHAPES OF DWELLING SITES.

pānīyaśālikā); however in *Mayamata* and cognate texts it is used either as synonymous with *maṇḍapa* or to designate a pavilion built in light materials for ceremonies (see below 25.26b and note ad loc.). *Raṅgamaṇḍapa* are most probably pavilions with one (or several) inner courts (covered by a lantern) described in chapter 25. However in the present case, the compound may be considered as a *dvandva* meaning 'canopies (or theatres) and pavilions'.

7. That term of unknown meaning may designate a kind of litter of palanquin; it does not appear in chapter 31 where similar conveyances are dealt with.
8. One may also understand as Stella Kramrisḥ does (*Hindu Temple*, vol. I, p. 21): the Earth is 'the first of the elemental principles (*bhūta*) and a support for the existence of the world'.
9. This verse (*triṣṭubh śālinī* metre) seems to have been interpolated in place of the second part of v.15 which is found at the beginning of the next chapter (v.1a).

अथ तृतीयोऽध्यायः

[भूपरीक्षा]

[1]देवानां [2]तु द्विजातीनां चतुरश्रायताः श्रुताः[3] ।
[4]वस्त्वाकृतिरनिन्द्या सावाक्प्रत्यग्दिक्समुन्नता ॥ १ ॥
[5]हयेभवेणुवीणाब्धिदुन्दुभिध्वनिसंयुता[6] ।
पुन्नाग[7] जातिपुष्पाब्जधान्य[8]पाटलगन्धकैः ॥ २ ॥
[9]पशुगन्धसमा श्रेष्ठा सर्वबीजप्ररोहिणी ।
[10]एकवर्णा घना स्निग्धा सुखसंस्पर्शनान्विता ॥ ३ ॥
बिल्वो निम्बश्च [11]निर्गुण्डी पिण्डितः सप्तपर्णकः ।
सहकारश्च षड्वृक्षैरारूढा [12]या समस्थला ॥ ४ ॥
श्वेता रक्ता च पीता च [13]कृष्णा कापोतसन्निभा[14] ।
तिक्ता च कटुका चैव कषायलवणाम्लका[15] ॥ ५ ॥
मधुरा [16]षड्रसोपेता सर्वसम्पत्करी [17]धरा ।
प्रदक्षिणोदकवती[18] वर्णगन्धरसैः शुभा ॥ ६ ॥
पुरुषाञ्जलि[19]मात्रे तु दृष्टतोया [20]मनोरमा ।
[21]निष्कपाला निरुपला कृमिवल्मीकवर्जिता ॥ ७ ॥

1. D : omits 1a
2. A (var) : च
3. B : चतुरश्रायता श्रुता; C : चतुरश्रायताः शुभाः
4. D : सुखावहमनिन्दश्च दक्षिणे पश्चिमोन्नतम्
5. D : तुरङ्गमातङ्गवणुं वीणासागददुन्दुभिः
6. B : दुन्दुभिस्पनसंयुत
7. D : जादि instead of जाति
8. D : पागळ
9. E : पशुहंससमा
10. F : एकवक्रा
11. D : निगुणि अशोकस्सप्तपर्णतः
12. D : स समस्तला
13. D : कृष्ण
14. F : कापोतसन्नभा
15. D : कषयालवणतांलता
16. D : षड्रशोपेता
17. D : धरी
18. D : भूमी instead of वती
19. D : मात्रेण दृष्टा तोया; E : मात्रेषु द्रवतोया
20. A (var), E : मनोहरा
21. D : निष्कपलनिष्कपाला;
F : निष्कपालानि निपला- कृमिलीलावर्जिता

Chapter 3

EXAMINATION OF THE SITE[1]

1 It is said that rectangular sites too are suitable for gods and for brahmins.[2] The shape of the site must be perfect and it must rise towards the west or south.

2-3 It must be filled with the sounds of horses, of elephants, of flutes, lutes, water and drums and must be impregnated with the fragrances of *puṃnāga*, jasmine, lotus, grain and *pāṭala*. Its odour is like that of cattle; it is perfect, able to make all the seeds grow[3] and of uniform colour. (Its soil) is compact, smooth and pleasing to the touch.

4-7a Six kinds of trees grow there: *bilva, nimba, nirguṇḍin, piṇḍita, saptaparṇaka* and *sahakāra*.[4] The ground is even; its colour is white, red, yellow or black as a pigeon; it has six flavours: bitter, pungent, astringent, salt, sour and sweet; such a ground is guarantee of success. The site must be bordered by a water course flowing to the right;[5] it must be of pleasant colour, odour and taste; if a handful (of earth) is taken up it should be pleasing to the sight and to the mind.

7b-10a (The ground) is free from potsherds, pebbles, worms, ants and bones; it is free from holes and is covered in white sand. It must be free from charcoal, stumps and every sort of pointed object as well as from sludge, dust, cavities and husks. Such a site is suitable for all castes and brings them success.

1. Cf. *Mānasāra* chapter 4, *Īśānaśiva* Kriyā chapter 23, *Ajita* 7.1-10.
2. See chapter 2 note 9.
3. That ability will be established at the time of the ploughing (4.4).
4. Those trees, different from those listed in 2.10 sq., seem to have in common the strong but more or less pleasing savour of their fruits.
5. When a site rises to the south or to the west, the water course flowing according to *pradakṣiṇa* runs from west to east or from south to north.

[22]अस्थिवर्ज्या नसुषिरा तनुवालुकसंयुता ।
[23]अङ्गारैर्वृक्षमूलैश्च शूलैश्चापि[24] पृथग्विधैः ॥ ८ ॥
[25]पङ्कसङ्कर[26]कूपैश्च [27]दारुभि[28]र्लोष्टकैरपि ।
[29]शर्कराभि[30]रयुक्ता या भस्माद्यैस्तु तुषैरपि ॥ ९ ॥
सा शुभा सर्ववर्णानां सर्वसम्पत्करी [31]धरा ।
दध्याज्यमधुगन्धा च तैलासृ[32]ग्गन्धिका च या ॥ १० ॥
शवमीनपक्षिगन्धा [33]सा धरा निन्दिता वरैः ।
सभा[34]चैत्यसमीपस्था नृपमन्दिर[35]संश्रिता ॥ ११ ॥
देवालयसमीपस्था [36]कण्टकिद्रुमसंयुता ।
वृत्तत्रिकोण [37]विषमा वज्राभा [38]कच्छपोन्नता ॥ १२ ॥
[39]चण्डालावासगच्छाया चर्मकारालयाश्रिता ।
एकद्वित्रिचतु[40]र्मार्गा [41]तरिताव्यक्तमार्गका ॥ १३ ॥
[42]निम्नं यत् [43]पणवाकारं पक्षीव [44]मुरजोपमम् ।
[45]मत्स्याभं तु [46]चतुष्कोणे महावृक्षसमायुतम् ॥ १४ ॥
[47]चैत्यवृक्षयुतं सालचतुष्कोणसमाश्रितम् ।
भुजङ्गनिलयं चैव [48]सङ्करारामेव च ॥ १५ ॥

22. D : हस्ति; E : आस्थवर्ज्यानुसुषिरा
23. D : अङ्गाराप्लक्षमलैश्च स्थाणुशुणकपृथक्कृतैः
24. E : वृक्षशूलैश्च शिलैश्चापि
25. D : पाक
26. D : कुचैश्च
27. A (var), C, E, F : दरिभिर
28. F : लोषिकैरपि
29. E : omits 9b.
30. C : वियुक्ता
31. D : धरी
32. A (var) : गन्धिनी; D : गन्धनी
33. A (var) : या सा धरा; D : च सा धरा
34. D : चैक्य for चैत्य
35. F : संयुता
36. B, D : कण्टक; E : कर्णकी
37. D : निम्ना च for विषमा
38. D : गञ्चलोन्नता
39. A (var), C : चण्डालावाससच्छाया; D : चण्डाला-वसकश्चाय
40. D : मार्गं; E : मत्स्यान्
41. D : अन्तरित्युक्तमार्गका
42. D : निम्नवत् फणवाकारपक्षवल्लीरवोपमम्
43. B : प्रणवाकारं; E : वज्रवाकारं
44. A, B, E, F : मुरपोपमम्; A (var) etc. : मुरपोपमम्
45. D : मत्स्याङ्गं
46. B (var) : चतुष्कोणं; C : चतुष्काणे
47. D : omits 15
48. E : शङ्करालयमेव च

10b-12 The sages however reject a site which smells like curds, melted butter, honey or oil, blood, carrion, fish or fowl. They reject, as well, a site which is too near a hall, a sacred place, a palace or a temple.[6] They reject one planted with thorn trees, one which is round, triangular, irregular or shaped like a *vajra*[7] and one (raised in the centre) like a tortoise shell.

13-15 They reject too (a site) overshadowed by the dwelling of a caṇḍāla or near the house of a tanner. In the same way they reject that which is on one, two, three or four roads or near a path smelling of garlic. They reject a site depressed (in the middle) like a *paṇava* drum and one in the form of bird, tambourine or fish. They reject those with large trees at the four corners, those planted with sacred trees and those whose four corners are lined by walls;[8] in the same way they reject one which is inhabited by a procurer[9] and one where there is a brothel.[10]

16-18 So too, they reject a site which is a cremation ground or a place of retreat as well as one in the shape of a porcupine, a monkey or a forest snake and, as well, one which is shaped like a hatchet, a winnowing basket, a conch or a stake.[11] So too, they reject one resembling a cat or a lizard, one which is desert or frequented (only) by worms, one in the

6. That is to say that one must avoid the vicinity of any place from where proceeds any power, human (assembly or king) or divine. One may think of those villages of Tamil Nadu where a house must not face a temple or a church (see e.g. *Census of India 1961—Madras State,* vol. VI/9 p. 23 [Thadagam] or vol. VI/19 p. 16 [Kottulal Azham Kullam]).
7. *Vajrābha*: that is to say narrow in the centre.
8. Or "whose four corners are next to *sāla* trees" (cf. *Mānasāra* 4.15b: *sālair yuktaṃ catuṣkoṇaiḥ* [?]).
9. Or "an abode for snakes" (*bhujaṅganilaya*).
10. *Saṅkarārāma*: a manuscript gives *śaṅkarārāma* ("garden pertaining to a Śiva temple"); see chapter 29 note 36.
11. The meaning of these comparisons is not clear; it seems that all irregular shapes are to be avoided (see above v. 12b). Some of those shapes are illustrated in a manuscript of *Śilpa Prakāśa* (A. Boner and Sadāśiva Rath Śarmā edition, pl. I).

श्मशानं चाश्रमस्थानं कपिसूकरसन्निभम् ।
[49]वनोरगनिभं टङ्कं शूर्पोलूखलसन्निभम् ॥ १६ ॥
शङ्खाभं [50]शङ्कुनाभं च बिडालकृकलासवत् ।
[51]ऊषरं कृमिभिर्जुष्टं गृहगौलिसमाकृति[52] ॥ १७ ॥
अन्यदेवंविधं [53]वस्तु निन्दितं वस्तुपाठकैः ।
बहुप्रवेशमार्गं च मार्गविद्धं च गर्हितम् ॥ १८ ॥
यत् कर्म विहितं [54]मोहादेवंभूते तु वस्तुनि ।
[55]तन्महादोषहेतुः स्यात् सर्वथा [56]तद् विवर्जयेत् ॥ १९ ॥
[57]श्वेतासृक्पीतकृष्णा हयगजनिनदा [58]षड्रसा चैकवर्णा
गोधान्याम्भोजगन्धोपलतुषरहितावाक्प्रतीच्युन्नता या ।
पूर्वोदग्वारिसारा वरसुरभिसमा शूलहीनास्थिवर्ज्या
सा भूमिः सर्वयोग्या कणदररहिता सम्मताद्यैर्मुनीन्द्रैः ॥ २० ॥

इति मयमते वस्तुशास्त्रे भूपरीक्षा नाम
तृतीयोऽध्यायः

49. D : वनोरेगनिभं टङ्कं; F : वनोरगनिषण्णां च
50. D : शङ्कुनाभं; E : शङ्कुराभं; F : शक्रनाभं
51. D : पौषं
52. C : समाश्रृतम्; D : समाकृतम्
53. E : वस्तुनिष्ठितं वास्तुसादकैः
54. E : मोहाद्देवभूते
55. E : तमुहादोषहेतु स्यात्
56. E : तु
57. E : omits 20.
58. D : षड्रसादेकवर्णा

shape of a house lizard[12] or in any other such shape. The sages condemn too a site to which several roads give access or which is crossed by a road.[13]

19 To erect a building on such a site, even by mistake, is the source of great misfortune; this is always to be avoided.

20 White, (red like) blood, yellow (or) black, resonant with the trumpeting of elephants and of horses, (endowed with) six flavours, of one colour, perfumed by cattle as well as by grain and lotus, free from pebble and husk, rising towards the south or west, bordered by a river in the north or east, equal to the perfect Surabhi, free from sharp objects and bones, such should be the site which, according to the best experts, is suitable for everybody and which does not wither the seeds.

Thus ends, in the *Mayamata*, treatise on dwelling, the third chapter: EXAMINATION OF THE SITE.

12. *Gṛhgauli* for *gṛhagola*.
13. The main gateways of a city are not to be brought into alignment (9.57 sq.).

अथ चतुर्थोऽध्यायः

[भूपरिग्रहः]

[1]आकारवर्णशब्दादि[2]गुणोपेतं भुवः स्थलम् ।
सङ्गृह्य [3]स्थपतिः प्राज्ञो दत्त्वा देवबलिं पुनः ॥ १ ॥
स्वस्तिवाचकघोषेण जयशब्दादिमङ्गलैः ।
अपक्रामन्तु भूतानि देवताश्च[4] सराक्षसाः ॥ २ ॥
[5]वासान्तरं व्रजन्त्वस्मात् [6]कुर्यां भूमिपरिग्रहम् ।
[7]इति मन्त्रं समुच्चार्य विहिते [8]भूपरिग्रहे ॥ ३ ॥
[9]कृष्ट्वा गोमयमिश्राणि सर्वबीजानि वापयेत्[10] ।
दृष्ट्वा [11]तानि [12]विरूढानि फलपक्वगतानि[13] च ॥ ४ ॥
सवृषाश्च सवत्साश्च ततो गास्तत्र वासयेत् ।
[14]यतो गोभिः परिक्रान्त[15]मुपघ्राणैश्च पूजितम् ॥ ५ ॥
[16]संहृष्टवृषनादैश्च निर्धौतकलुषीकृतम् ।
वत्सवक्त्रच्युतैः फेनैः संस्कृतं [17]प्रस्त्रवैरपि ॥ ६ ॥
स्नातं गोमूत्रसेकैश्च [18]गोपुरीषैः सलेपनम् ।
[19]च्युतरोमन्थनोद्गारैर्गोष्पदैः कृतकौतुकम् ॥ ७ ॥

1. F : अधार
2. D : गुणोभेदं
3. D : स्थपती
4. E : चपि राक्षसाः
5. D : वसान्तरसृजन्त्वयस्मिन् ;
   E : वासान्तराव्रजं तस्मात्
6. A (var), E : कुर्याद् ; D : क्रियां
7. D, F : इदं
8. D : भूपरिग्रहं
9. A : कृष्टा; D : कृष्या; F : कृष्णा
10. F : धापयेत्
11. E : यानि
12. D : परुधानि; F : विनिडानि
13. D : प्रसूनि
14. A (var) : यदा; D : यथा
15. D : उपप्रणैश्च
16. A (var) : संहृष्टवृषदानैश्च; E : सकृष्टवृषनादिस्तु
17. A (var) : प्रस्तुतैरपि ; C : प्रस्लवैरपि ; D : प्रसवैरपि
18. A (var), D, E, F : गोपुरीषनुलेपनम्
19. D : च्युतरोमन्दिराद्गारैर्गोपदैः

Chapter 4

TAKING POSSESSION OF THE SITE[1]

1-3 Once he has chosen a piece of land endowed with the prescribed qualities of shape, colour, sound (. . . etc.), the learned architect should make an offering to the gods accompanied by exclamations such as '*Svasti*' and cries of good omen such as '*Jaya*'. Next he pronounces this formula: "That Spirits, Gods and Demons depart! That they leave this place and go elsewhere for I take possession."[2] Thus possession is taken of the site.

4 After ploughing,[3] (the architect) must sow seeds of all kinds mixed with cow-dung; then having seen them germinate and reaped the fruits, he puts cows there along with bulls and calves.

5-8a In this way (the site) will be stamped down by the cows, sanctified by their breath, purified by the contented lowing of the bulls and consecrated by the froth which flows from the mouths of the calves; it will be bathed by jets of cows' urine, coated with dung and made fertile

1. See *Ajita* (chapter 7) and *Mānasāra* (chapter 5).
2. Similar *mantras* are used when cutting down a tree (15.89-90) or quarrying out a stone (33.27).

गोगन्धेन [20]समाविष्टं [21]पुण्यतोयैः शुभं पुनः ।
तथा पुण्यतिथोपेते [22]नक्षत्रविषये [23]शुभे ॥ ८ ॥
करणे च सुलग्ने च मुहूर्ते च बुधेप्सिते[24] ।
अक्षतैः [25]श्वेतपुष्पैश्च बलिकर्म विधीयते ॥ ९ ॥
ब्राह्मणैश्च यथाशक्त्या वाचयेत् [26]स्वस्तिवाचकम् ।
[27]वस्तुमध्ये ततस्तस्मिन् खानयेद् वसुधातलम् ॥ १० ॥
[28]अरत्निमात्रगम्भीरं चतुरश्र[29]समन्वितम् ।
दिग्भाग[30]स्थमसम्भ्रान्तमसंक्षिप्तसमुच्छ्रयम् ॥ ११ ॥
अर्चयित्वा यथान्यायं तं [31]कूपमभिवन्द्य च ।
[32]चन्दनाक्षतमिश्रेण [33]सर्वरत्नोदकेन च ॥ १२ ॥
[34]पयसा तु ततः प्राज्ञो निशादौ परिपूरयेत् ।
तस्य [35]कूपस्य चाभ्याशे शुचिर्भूत्वा [36]समाहितः ॥ १३ ॥
भूमौ दर्भावकीर्णायां संविशेत् [37]प्राक्शिरा बुधः ।

अयं मन्त्रः —

अस्मिन् वस्तुनि वर्धस्व धनधान्येन [38]मेदिनि! ॥ १४ ॥
उत्तमं वीर्यमास्थाय नमस्तेऽस्तु शिवा भव ।
उपवासमुपक्रामेदेतं मन्त्रं जपंस्ततः ॥ १५ ॥

20. D : समापिष्ठा
21. E : पुण्यतोयशुभ
22. B : नक्षत्रे
23. F : शुभा
24. A (var) : बुधेस्थिते; D : बुधेस्थितैः ; F : शुभेक्षिते
25. A (var) : श्वेतवृक्षैः; D : चैव पुष्पैः
26. D : स्वस्तिवाचकैः
27. E : वस्तुमध्येन तत्तस्मिन् ; D : तन्मध्ये कृतकूपेऽस्मिन्
28. D : रत्निमात्रसगम्भीरं; F : अरत्निमात्रमायाथं
29. D, E, F : समन्ततः
30. A (var), C : स्तम्भ for स्थम
31. C : रूपमभिवन्द्य च; D : कूपमपिवन्दते
32. D : चन्दनाक्षतृणश्रेण
33. A (var) : सर्वरत्नोषितेन; C : सर्वगन्धोदकेन
34. D : पायसान्तं ततः
35. C, E : रूपस्य
36. A (var) : समास्थितः
37. D, F : प्राक्शिरो विदुः
38. B, F : मेदिनी

by the spittle, the cows spew out whilst chewing the cud and by their stamping; it will be permeated by their odour and, lastly, will be consecrated by sprinkling of holy water.

8b-10a Next, on a lunar day chosen as auspicious according to the configuration of the asterisms, in the favourable half of the day at a moment determined by an inspired man, hulled rice and white flowers are to be offered and, if possible, brahmins should pronounce propitious words.

10b-15 Next, at the centre of the site a square piece of land orientated to the cardinal points must be dug out to the depth of one cubit; this is to be done faultlessly so that the pit is not too narrow nor too deep. Next, once he has offered prayers according to the ritual and has consecrated this pit with water of all jewels mixed with sandal and hulled rice, the wise man should fill it with water at nightfall. Then, after purifying himself and concentrating his mind, he lies down on the ground beside the pit facing east and he begins his fast by pronouncing this formula: "Earth, at this site, prosper in riches and in harvests! be fecund! Salutations to Thee! be propitious!".

16-18a At daybreak the wise architect examines the pit;[4] if he sees a small residue of water he is to consider this as a guarantee of success; if the pit is damp, buildings will be destroyed and if it is dry harvests and riches will disappear. When the hole is filled up with its own earth the site is of

3. For descriptions of the ploughing of the site see *Ajita* 7.11-26 or *Mānasāra* 5.38 sq.
4. According to *Īśānaśiva* (Kriyā. 23.39-40), once the pit is filled up with water, the architect takes one hundred steps away, then comes back to see what water remains; according to *Ajita* (7.9-10) he just takes ten steps.

[39]अह्न आदौ परीक्षेत तं [40]कूपं स्थपतिर्बुधः ।
[41]सावशेषं जलं दृष्ट्वा तद् ग्राह्यं [42]सर्वसम्पदे ॥ १६ ॥
[43]क्लिन्ने [44]वस्तुविनाशाय शुष्के धान्यधनक्षयः ।
[45]पूरिते तन्मृदा खाते समता मध्यमा मता[46] ॥ १७ ॥
उत्तमा [47]भूर्मृदाधिक्या हीना हीना मृदा मही ।
[48]तन्मध्यावटसन्दृष्टप्रदक्षिणचरोदकाम् ॥ १८ ॥
[49]सुरभिप्रतिमां [50]भूमिं गृह्णीयात् सर्वसम्पदे ।
एवं यथोक्तविधिना [51]विविधं विदित्वा
ग्रामाग्रहारपुरपत्तनखर्वटानि ।
स्थानीयखेटनिगमानि तथेतराणि
यः संविविक्षुरवनीग्रहणं विदध्यात् ॥ १९½ ॥

इति मयमते वस्तुशास्त्रे भूपरिग्रहो नाम
चतुर्थोऽध्यायः

39. C : अदौ पादौ; D : अन्य आदौ
40. C : रूपं
41. D : तावशेषं
42. D : सर्वसम्पदैः
43. F : क्लिक्ते
44. C : वस्तुनि वै नाशः
45. F : omits 17b-19
46. D : घया
47. C : तु मृदाधिक्या
48. A (var) C : तन्मध्यादवटं दृष्ट्वा प्रदक्षिणचरोदकम्; D : तन्मध्यघटकं दृष्ट्वा प्रदक्षिणपरोदकम्
49. A (var) : सुरभिः
50. C : मन्त्री instead of भूमिं
51. B : त्रिविधं

average quality if the pit is completely full; if it overflows with earth the site will prove excellent and if it is not packed full with earth it is of inferior quality.[5]

18b It is after this investigation, carried out in a pit in the centre of the site, that, for the sake of success, the (definitive) choice is to be made of a site which is said to be in the image of Surabhi and which is bordered by a river flowing to the right.

19 After recognition of the different types of sites, with the help of the rules given above, he who envisages (establishing) *grāma, agrahāra, pura, pattana, kharvaṭa, sthānīya, kheṭa, nigama* or other settlements,[6] must take possession of the site.

Thus ends, in the *Mayamata,* treatise on dwelling,
the fourth chapter: TAKING POSSESSION OF THE SITE

5. That is to say that success will expand as does the earth.
6. These settlements are described in 9th and 10th chapters.

अथ पञ्चमोऽध्यायः

[मानोपकरणम्]

सर्वेषामपि वास्तूनां मानेनैव[1] विनिश्चयः ।
[2]तस्मान्मानोपकरणं वक्ष्ये संक्षेपतः क्रमात् ॥ १ ॥
परमाणुक्रमाद्[3] वृद्धं मानाङ्गुलमिति स्मृतम् ।
परमाणुरिति प्रोक्तं योगिनां [4]दृष्टिगोचरम् ॥ २ ॥
परमाणुभिरष्टाभी रथरेणु[5]रुदाहृतः ।
रथरेणुश्च [6]वालाग्रं[7] लिक्षायूकायवास्तथा ॥ ३ ॥
क्रमशोऽष्टगुणैः प्रोक्तो यवाष्टगुणितो[8]ऽङ्गुलम् ।
अङ्गुलं तु भवेन्मात्रं [9]वितस्तिर्द्वादशाङ्गुलम् ॥ ४ ॥
[10]तद्द्वयं [11]हस्तमुद्दिष्टं तत् किष्किति मतं वरैः ।
पञ्चविंशतिमात्रं तु प्राजापत्यमिति स्मृतम् ॥ ५ ॥
[12]षड्विंशतिर्धनुर्मुष्टिः सप्तविंशद्धनुर्ग्रहः ।
याने [13]च शयने किष्कुः प्राजापत्यं विमानके ॥ ६ ॥
वास्तूनां तु धनुर्मुष्टिर्ग्रामादीनां [14]धनुर्ग्रहः ।
सर्वेषामपि वास्तूनां किष्कुरे[15] वाथवा मतः ॥ ७ ॥

1. C : विनिश्चयम् ; F : हि निश्चयः
2. D : replaces 1b by:
   तस्मात्सर्वप्रयत्नेन हस्तमानेन वक्ष्यते ।
   मानोपकरणं सर्वं वक्ष्ये सङ्क्षेपतः कमात् ॥
3. D : वृद्धि
4. F : ऋषिगोचरः
5. D : उदाहृता
6. D : केशाग्रं
7. A (var), C : लिख्यलूकायवस्तथा
8. A (var) : अङ्गुलिम्
9. F : विकस्त
10. D : omits 5a
11. F : हस्तमित्युक्तं तन्निष्कृतिमतं वरैः
12. D : षड्विंशद्धनुमुष्टिश्च
13. D : न
14. B : धनुग्रहः
15. D : एव परो मतः

CHAPTER 5

SYSTEM OF MEASUREMENTS[1]

1 All dwellings are defined by their dimensions; I am going to present as well, methodically though in few words, the system of measurements.

2 The digit[2] is known to be a multiple of an atom; an atom is defined as that which can be perceived by the vision of those who have mastered their senses.

3-6a Eight atoms are equal to a speck of dust and, in multiplying each time by eight, we go from a speck of dust to the tip of a hair, then to a nit, to a louse and finally to a barley grain. Eight barley grains make a digit which is called as well "measure".[3] Twelve digits make a span[4] twice which is a cubit, called by the learned, as well, "forearm";[5] twenty-five digits make a *prājāpatya*, twenty-six a *dhanurmuṣṭi* and twenty-seven a *dhanurgraha*.[6]

1. For an overall view on system of measurements see S. Srinivasan, *Mensuration in Ancient India* (Delhi 1979); see also Kaye 1927 pp. 60-61, Kane vol. III pp. 145 and 500. For measurements in *śilpa* and cognate literature see Acharya 1946 sv. *Aṅgula*, Dagens 1984 pp. 13 sq. and Dagens 1989. Linear measurements only are dealt with in this chapter; for surface measurements see 9.2-3. Verses 2 to 4 of this chapter are quoted in Raghavabhaṭṭa's commentary (15th century) of *Śāradātilaka* (3.53); see also below chapter 6 note 1.
2. *Mānāṅgula*: literally "the digit taken as a measure"; for other types of *aṅgula* see below vv. 11-12.
3. *Mātra*: this term is often used as a substitute to *aṅgula*. We are given here the set of 'formless' (*amūrta*) units which goes from the *paramāṇu* up to the *yava*; this last is the only one to be of practical use. Some texts (*Mānasāra* 2.40-46, *Ajita* 12.3-5, *Kāmika* I.16.1-4) prescribes three different values for the digit (6, 7 and 8 *yava*).
4. *Vitasti*: also called *tāla* (see 15.107 or *Kāraṇāgama* I.7.6); that last term is also applied to an iconometric relative unit (see Dagens 1989).
5. *Hasta* is the most often used term for naming the cubit; but several synonyms are also found: thus *kiṣku* (literally 'forearm') and the terms listed below (v. 8a).
6. The *Arthaśāstra* (II 20.8-16) lists the same terms than the *Mayamata* but with slightly different definitions.

रत्निश्चैवमरत्निश्च भुजो बाहुः करः स्मृतः ।
[16]हस्ताश्चतुर्धनुर्दण्डो यष्टिश्चैव प्रकीर्तितः ॥ ८ ॥
दण्डेनाष्टगुणा रज्जुर्दण्डैर्ग्रामं च पत्तनम् ।
[17]नगरं निगमं [18]खेटं वेश्मादीन्यपि [19]मानयेत् ॥ ९ ॥
[20]गृहादीनां तु हस्तेन याने च शयने बुधैः ।
[21]वितस्तिना विधातव्यं क्षुद्राणामङ्गुलेन तु ॥ १० ॥
[22]यवेनाल्पीयसां मानमेवं मानक्रमं विदुः ।
[23]मध्यमाङ्गुलिमध्यस्थपर्वमात्रायतं तु यत् ॥ ११ ॥
[24]कर्तुर्मात्राङ्गुलं प्रोक्तं यागादीनां प्रशस्यते ।
देहलब्धाङ्गुलं [25]यत्तदुपरिष्टाद् विधीयते ॥ १२ ॥
एवमेवं विदित्वा तु स्थपति[26] र्मानयेद् दृढम् ।

[शिल्पिलक्षणम्]

भवन्ति शिल्पिनो [27]लोके चतुर्धा स्वस्वकर्मभिः ॥ १३ ॥
[28]स्थपतिः सूत्रग्राही च [29]वर्धकिस्तक्षकस्तथा ।
प्रसिद्धदेशसङ्कीर्णजातिजो[30]ऽभीष्टलक्षणः ॥ १४ ॥
स्थपतिः स्थापनार्हः स्यात् सर्वशास्त्र[31]विशारदः ।
न हीनाङ्गोऽतिरिक्ताङ्गो धार्मिकस्तु दयापरः ॥ १५ ॥
अमात्सर्योऽनसूयश्चा[32]तन्द्रितस्त्वभिजातवान् ।
[33]गणितज्ञः पुराणज्ञः सत्यवादी जितेन्द्रियः ॥ १६ ॥

16. F : हस्ताश्च धनुर्दण्डा
17. E : नगनं
18. D : गेहं
19. A (var), B, E : मापयेत्
20. D : ग्रामादीनां
21. D : वितस्तिनां
22. D : यवेन शिल्पिसम्मानं
23. E : मध्यमाङ्गुलिमध्यस्थं पर्वं मानाङ्गुलेन तु
24. E : कर्तुमात्राङ्गुलैः
25. D : प्रोक्तं
26. A (var), B, D : मापयेत्
27. D : यागे
28. D : omits verse 14.
29. F : वर्धितिः
30. C : ऽस्य हि लक्षणम्
31. D : विचारतः
32. C : च तन्त्रिकः
33. E : गुणितज्ञः

6b-11a For vehicles and seats the cubit (is used), for buildings the *dhanurmuṣṭi* and for villages and so on the *dhanurgraha;* the (ordinary) cubit however may serve for any building;[7] it is also called *ratni, aratni, bhuja, bāhu* and *kara*.[8] Four cubits make a pole,[9] also called *yaṣṭi*; eight poles make a rope.[10] Villages are to be measured in poles as are *pattana*, towns, *nigama*, *kheṭa*, palaces . . . etc.; but houses are to be in cubits. The sages should employ the span for vehicles and seats, the digit for small (objects) and the barley grain for very small ones. Such is the system of measurements.

11b-12 The *mātrāṅgula* is equal to the middle phalanx of the middle finger of the officiating priest; it is (to be used for measurements relating to) sacrifices . . . etc.;[11] that which has just been mentioned is also called "digit taken from the body".[12]

13a Knowing all this the architect must measure rigorously.

The Technicians[13]

13b-14a Here below, there are four sorts of builders each with their function: the architect, the *sūtragrāhin*, the *vardhaki* and the *takṣaka*.

14b-18a The architect is from a renowned land and he is of mixed caste;[14] a man of quality, he must know how to establish buildings and must be well versed in all the sciences; he must be physically perfect,[15] just, compassionate. disinterested, free from envy, without weakness, hand-

7. This appears to be the general rule; the distinction given just above seems to remain largely theoretical.
8. Cf. *Īśānaśiva* (Kriyā. 24.29):
   आसन्धेर्बद्धमुष्टिस्तु रत्निः कर उदाहृतः ।
9. *Daṇḍa* is also the name of the 'module' which is the basic relative unit of measurement in architecture (cf. 15.28-29). For the iconometric module see below note 12.
10. According to *Arthaśāstra* (II.20.21) the *rajjus* is of ten *daṇḍa*.
11. Cf. *Suprabhedāgama* (Kriyā. 30.8):
   कूर्चे पवित्रके चैव स्रुवे स्रुग्भिरथान्यकैः ।
   यागे प्रयोजितानीह मात्राङ्गुलिविधिश्चरेत् ॥
12. The *dehalabdhāṅgula* is often defined as an iconometric relative unit; cf. *Ajita* 12.13:
   प्रतिमायाः समुत्सेधे तालगण्येन भाजिते ।
   यदङ्गुलं भवेत् तत्तु देहलब्धाङ्गुलं भवेत् ।
13. Cf. *Mānasāra* 2.1-38 where is given the divine genealogy of the *sthapati* and of his assistants. See also Acharya 1946 sv. *sthapati*.
14. Cf. Kane II p. 94; the *takṣaka* form a caste (ibid. p. 83) and *vardhaki* pertain to Kāyastha (ibid.). Sometimes *takṣaka* is synonymous with *sthapati* (see e.g. 28.10, 21, 30).
15. Literally: 'he must not have any missing or supplementary limb'.

[34]चित्रज्ञः सर्वदेशज्ञ[35]श्चान्नदश्चाप्यलुब्धकः ।
अरोगी [36]चाप्रमादी च [37]सप्तव्यसनवर्जितः ॥ १७ ॥
[38]सुनामा [39]दृढबुद्धिश्च वास्तुविद्याब्धिपारगः ।
स्थपतेस्तस्य शिष्यो वा सूत्रग्राही सुतोऽथवा ॥ १८ ॥
स्थपत्याज्ञानुसारी च सर्वकर्मविशारदः ।
सूत्रदण्ड[40] प्रपातज्ञो मानोन्मानप्रमाणवित् ॥ १९ ॥
शैलदार्विष्टकादीनां सूत्रग्राहिवशानुगः[41] ।
[42]तक्षणात् स्थूलसूक्ष्माणां तक्षकः स तु कीर्तितः ॥ २० ॥
मृत्कर्मज्ञो गुणी शक्तः [43]सर्वकर्मस्वतन्त्रकः ।
[44]तक्षितानां तक्षकानामुपर्युपरि युक्तितः ॥ २१ ॥
वृद्धिकृद् [45]वर्धकिः प्रोक्तः सूत्रग्राह्यनुगः सदा ।
[46]कर्मिणो निपुणाः शुद्धा बलवन्तो दयापराः ॥ २२ ॥
[47]गुरुभक्ताः सदा हृष्टाः स्थपत्याज्ञानुगाः सदा ।
तेषामेव स्थपत्याख्यो विश्वकर्मेति [48]संस्मृतः ॥ २३ ॥
एभिर्विना हि सर्वेषां कर्म कर्तुं न शक्यते ।
[49]तस्मादेतत् सदा पूज्यं स्थपत्यादिचतुष्टयम् ॥ २४ ॥
एभिः स्थपत्यादिभिरत्र लोके
विना [50]ग्रहीतुं सुकृतं न शक्यम् ।
तैरेव सार्धं गुरुणाऽथ तस्माद्
भजन्ति मोक्षं भवतस्तु मर्त्याः ॥ २५ ॥

इति मयमते मानोपकरं नाम
पञ्चमोऽध्यायः

34. A (var) : सर्वज्ञः; F : पितृज्ञः
35. D : चान्त्यदश्चापि
36. D : च प्रकृति
37. D : शब्द
38. F : सुमान
39. A (var) : दृढबन्धुश्च
40. D : प्रपादज्ञो
41. A, B, D, E, F : सूत्रग्रहिवशात् तु यत्
42. D : तक्षाणां मूलसूक्ष्मानां तक्षका त्विति कीर्तितम्
43. E, F : सर्वकर्मस्वतत्रितः
44. A, B, C, D.: तक्षकस्तक्षेणास्मिन्नुपर्युपरि युक्तितः; E and F : तक्षकं etc. ...; we amend on the basis of *Vāstuvidyā* 1.17b
45. F : वर्धति
46. C et D : कर्मणो
47. D : गुरुभक्तात्
48. D : संस्मृतम्
49. D : तस्मातेते सदा पूज्या
50. C : गृहितं

some, and learned in mathematics; he must know the ancient authors and must be straightforward and master of his senses: he must be able to draw and must know the whole country; he must be generous and not greedy; his health must be good, he must be attentive and free from the seven vices,[16] possessor of a well chosen name and persevering; he must have crossed the ocean of the science of architecture.

18b-19 The *sūtragrāhin* is the disciple or the son of the architect;[17] he follows his directions. He is skilful in all the arts; he knows how to make the rop and rod fly and how to measure length, height and proportions.[18]

20 The *takṣaka* is so named because he cuts the stone, wood, bricks . . . etc. into small or large pieces.[19]

21-22a Versed in masonry,[20] virtuous, capable and cognizant of his trade, he who assembles and correctly erects the pieces cut by the *takṣaka* is the *vardhaki*; it is said that he always works under the order from the *sūtragrāhin*.

22b-24 They are active, skilful, pure, strong, compassionate, always respectful towards the master and joyous; they are always faithful to the architect's instructions because, to them, it is Viśvakarman is person who is revealed through his aspect, though without them he can do nothing; that is why the tetrad led by the architect must always be honoured.

25 Without these technicians led by the architect nothing beneficial can be embarked upon here below but with them as with a guru, mortal beings attain deliverance.

Thus ends, in the *Mayamata*, treatise on dwelling,
the fifth chapter: SYSTEM OF MEASUREMENTS.

16. *Saptavyasana*: cf. *Arthaśāstra* VIII.3. 23 (vices springing from anger: verbal injury, violation of property and physical injury) and 32 (vices springing from lust: hunting, gambling, women and drink).
17. If the architect dies without completing a work this can be done only by his son or his disciple (18.159-160).
18. That is to say that he is in charge of all laying-out operations described in chapter 6.
19. Literally: 'The cutter is so-called from the cutting . . .'.
20. *Mṛtkarmajña*: literaly 'knowing the work of the earth'; this seems to allude to cobwork construction (see e.g. 27.10)

अथ षष्ठोऽध्यायः[1]

[दिक्परिच्छेदः]

वक्ष्येऽहं दिक्परिच्छेदं शङ्कुनार्कोदये सति ।
उत्तरायणमासे तु शुक्लपक्षे शुभोदये ॥ १ ॥
प्रशस्तपक्षनक्षत्रे[2] विमले सूर्यमण्डले ।
गृहीतवास्तुमध्ये तु समं कृत्वा भुवः स्थलम् ॥ २ ॥
जलेन दण्डमात्रेण समं तु चतुरश्रकम् ।

[शङ्कुलक्षणम्]

तन्मध्ये स्थापयेच्छङ्कुं तन्मान[3]मधुनोच्यते ॥ ३ ॥
[4]अरत्निमात्रमायाममग्रमेकाङ्गुलं भवेत् ।
मूलं पञ्चाङ्गुलं व्यासं सुवृत्तं निर्व्रणं वरम्[5] ॥ ४ ॥
अष्टादशाङ्गुलं मध्यं कन्यसं द्वादशाङ्गुलम् ।
[6]आयामसदृशं नाहं[7] मूलेऽग्रे[8] तु नवाङ्गुलम् ॥ ५ ॥
दन्तं वै चन्दनं चैव खदिरः कदरः[9] शमी ।
शाकश्च तिन्दुकश्चैव शङ्कुवृक्षा उदीरिताः[10] ॥ ६ ॥
अन्यैः सारद्रुमैः प्रोक्तं तस्याग्रं चित्रवृत्तकम्[11] ।
शङ्कुं कृत्वा दिनादौ तु स्थापयेदात्तभूतले[12] ॥ ७ ॥
शङ्कुद्विगुणमानेन तन्मध्ये मण्डलं लिखेत् ।
पूर्वापराह्णयोश्छाया यदि तन्मण्डलान्तगा[13] ॥ ८ ॥

1. Chapter missing in D.
2. B (var) : वरनक्षत्रे
3. F : तत् ध्यान
4. E : मूलतारं रसाङ्गुल्यमग्रं भवेत्
5. C : परम्
6. E : आवामसदृशं
7. C : दैर्घ्यं
8. B (var) : मूलेऽन्त्यं
9. C : कूटरः; E : कुकरः; F : कुदरः
10. A (var) : इतीरिताः
11. F : चक्रवृत्तकम्
12. F : अत्तभूतले
13. F : तन्मण्डलान्ततः

Chapter 6

ORIENTATION[1]

1-2a Now I give the method of determining the cardinal points with the help of a gnomon. (One should proceed) at sunrise during a month when the solar path is. towards the north[2] during a bright fortnight, when sunrise is beautiful, the sun is in the asterism of the appropriate fortnight and when there are no spots on the solar disc.[3]

2b-3a A piece of ground in the middle of the chosen site should be levelled by the water method;[4] this must be a square of one square pole in the centre of which the gnomon should be set.

The gnomon[5]

3b-5 Herewith the dimensions of the gnomon; the best is one cubit long, its diameter is one digit at the top and five at the bottom, it is perfectly circular and without irregularities; one of medium size (has a length of) eighteen digits and a small one a length of twelve or nine digits, their diameter at the top and bottom being (in all cases) proportionate to their length.

6-7a The materials prescribed for the making of the gnomon are as follows: ivory, sandalwood, wood of *khadira, kadara, śamī, śāka* or *tinduka* or other hard woods; its tip should be perfectly circular.[6]

7b-8a When the gnomon has been made it is set up in the chosen place at sunrise, then a circle is drawn of which the gnomon is the centre and of which the diameter is double the length of the gnomon.

1. Cf. *Mānasāra* (chapter 5), *Ajita* (chapter 9) and *Īśānaśiva* (Kriyā 24.1-24). See also M. Yano, "Knowledge of Astronomy in Sanskrit Texts of Architecture (Orientation Methods in the *Īśānaśivagurudevapaddhati*)", *Indo-Iranian Journal*, 29 (1986), pp. 17-29. Verses 8 to 10a of this chapter are quoted in Raghavabhaṭṭa commentary of *Śāradātilaka* (3.21); see also above chapter 5 note 1.
2. However it is said later (v. 11) that this operation can be done at any time in the year (same prescription in *Mānasāra* 6.5; contra: *Ajita* 9.2 and *Īśānaśiva* Kriyā. 24.1).
3. Or "when the solar disc is not obscured (by clouds)".
4. For details about this method see *Kāmika* I.15. 1-20 (quoted in *Ājitāgama* vol. 1, p. 52, note 3).
5. About the gnomon (*śaṅku*) see *Mānasāra* 6.13-22, *Ajita* 9.5-7 and Kaye 1924 p. 67-68.
6. *Citravṛttaka*: in the *Mānasāra* (6.18) it is said that the tip of the gnomon is "like an umbrella" (*chattrākāra*), that is to say "conical".

[14]तद्बिन्दुद्वयगं सूत्रं पूर्वापरदिशीष्यते ।
बिन्दुद्वयान्तर[15] भ्रान्तशफराननपुच्छगम् ॥ ९ ॥
[16]दक्षिणोत्तरगं सूत्रमेवं सूत्रद्वयं न्यसेत् ।
उदगाद्यपरान्तानि पर्यन्तानि विनिक्षिपेत् ॥ १० ॥
सूत्राणि स्थपतिः प्राज्ञः प्रागुत्तरमुखानि च ।

[अपच्छाया]

कन्यायां वृषभे राशावपच्छायात्र[17] नास्ति हि ॥ ११ ॥
मेषे च मिथुने सिंहे तुलायां द्व्यङ्गुलं नयेत् ।
कुलीरे वृश्चिके मत्स्ये शोधयेच्चतुरङ्गुलम् ॥ १२ ॥
धनुःकुम्भे षडङ्गुल्यं मकरेऽष्टाङ्गुलं तथा[18] ।
छायाया दक्षिणे वामे नीत्वा सूत्रं प्रचारयेत् ॥ १३ ॥

[रज्जुलक्षणम्]

[19]अष्टयष्ट्यायता रज्जुस्तालकेतकवल्कलैः[20] ।
कार्पासपट्टसूत्रैश्च दर्भैर्न्यग्रोधवल्कलैः ॥ १४ ॥
[21]अङ्गुलाग्र[22]समस्थूला त्रिवर्तिर्ग्रन्थिवर्जिता ।
देवद्विजमहीपानां शेषयोश्च द्विवर्त्तिका ॥ १५ ॥

[खातशङ्कुलक्षणम्]

खदिरः खादिरश्चैव मधूकः क्षीरिणी[23] तथा ।
खातशङ्कुद्रुमाः प्रोक्ता अन्यं वा सारदारुजम्[24] ॥ १६ ॥
एकादशाङ्गुलाद्येकविंशन्मात्रं तु दैर्घ्यतः[25] ।
पूर्णमुष्टिस्तु नाहं स्यान्मूलं सूचीनिभं भवेत् ॥ १७ ॥

14. A (var), C : तद्वीजद्वयगं
15. E : ग्रन्तं for भ्रान्त
16. E : omits 10 and 11.
17. C : उषच्छायात्र; F : अवच्छायात्र
18. F : मतम्
19. E : अष्टयष्ट्यां यता
20. C : केतकवल्कलैः
21. B (var) : अङ्गुल्य
22. C : समा स्थूला
23. F : क्षरणी
24. F : सारदानिजं
25. F : मात्रान्तमायतम्

8b-11a The line which joins the two points where the shadow (of the gnomon) has touched the circle, in the morning and in the evening, gives the east-west direction.[7] The line which passes through the space between these two points and (which is like that which) connects the head and tail of a carp, is the north-south axis; the sage should draw these two lines. Then the circles which have their centres at the east and west points should be drawn.[8]

The apacchāyā[9]

11b-13 (When the sun) is in Taurus or in Virgo there is no *apacchāyā*; when it is in Aries, Gemini, Leo or Libra the (east-west axis) must be put back two digits; when it is in Cancer, Scorpio or Pisces it must be adjusted by four digits; when it is in Sagittarius or Aquarius (it must be adjusted) by six digits and when it is in Capricorn by eight digits. The east-west line is to be fixed after it has been moved to the right or to the left of the shadow.

The rope

14-15 The rope measures eight poles[10] and should be made with palm tree or *ketaka* fibres or with strips of cotton or with bark of *nyagrodha* or with *darbha* grass. It has a uniform thickness of one digit at most. For gods, brahmins and kings it is made of three strands and it is without knots but for the other two classes it is made of no more than two.[11]

The stakes[12]

16-17 The following woods should be used for stakes: *khadira, khādira, madhūka, kṣīriṇī* or other hard woods. The length of the stakes goes from eleven to twenty-one digits, their diameter is that of a closed fist and their bottom end is pointed.

7. The radius of the circle being equal to the height of the gnomon, the shadow touches the circle when the sun is at 45°, in the morning and in the afternoon.
8. See figure 1 (p. XLIV).
9. About *apacchāyā* (or *avacchāyā*, *upacchāyā*) see M. Yano's article quoted above (note 1); different values are given in v. 27.
10. Cf. 5.9.
11. Thus the rope is to be like the sacrificial thread (*yajñopavīta*).
12. *Khātaśaṅku*: these 'buried stakes' will be used at the time of the laying-out to mark the place of the different parts of the building and will remain in the ground afterward.

गृहीत्वा वामहस्तेन प्राङ्मुखो वाप्युदङ्मुखः ।
[26]दक्षिणेनाष्ठीलं गृह्य ताडयेदष्टभिः क्रमात् ॥ १८ ॥
प्रहारैः स्थपतिः प्राज्ञस्तत् कुर्यात्[27] स्थापकाज्ञया ।

[सूत्रविन्यासम्]

प्रमाणसूत्रमित्युक्तं प्रमाणैर्निश्चितं हि यत् ॥ १९ ॥
तद्बहिः परितो भागे सूत्रं पर्यन्तमिष्यते ।
गर्भसूत्रादिविन्याससूत्रं देवपदोचितम् ॥ २० ॥
पदविन्याससूत्रं हि विन्यासः[28] सूत्रमिष्यते ।
[29]गृहाणां दक्षिणे गर्भस्तत्पार्श्वे सूत्रपातनम् ॥ २१ ॥
तत्सूत्राच्छङ्कुमानेन नीत्वा शङ्कुं[30] निखानयेत् ।
उपानं निष्क्रमार्थं वा भित्त्यर्थं वाऽथ[31] तद् भवेत् ॥ २२ ॥
नगरग्रामदुर्गेषु वाय्वादी[32] रज्जुपातनम् ।
[33]अवाच्याशाद्युदीच्यन्तं प्राक्प्रत्यग्गतसूत्रकम् ॥ २३ ॥
प्रतीच्याशादिपूर्वान्तं विसृजेद् दक्षिणोत्तरम् ।
ब्रह्मस्थानात् पूर्वगतं तत् त्रिसूत्रं[34] तदुच्यते ॥ २४ ॥
ततो धनं पश्चिमगं धान्यं दक्षिणगं ततः ।
ब्रह्मस्थानादुत्तरगं सुखमित्यभिधीयते ॥ २५ ॥

26. A, B, E, F : दक्षिणेनाष्टलं; C : दक्षिणेनाथ संगृह्य
27. A, B, C, E, F : तच्छङ्कु
28. E : विन्यासं
29. C : गृहाणां दक्षिणे पाश्वें गर्भस्तत्सूत्रपादनम्
30. A (var), B (var), C : सूत्रं instead of शङ्कुं
31. A (var), C : वा च
32. A (var), B (var) : वास्त्वादी
33. C : अवाच्यादावुदीच्यन्तं
34. E : वर्णसूत्रं instead of त्रिसूत्रं; F : अन्नसूत्रं

18-19a Grasping the stake in his left hand and holding a pebble in the right, the sage architect, turning to the east or the north, must knock eight successive times at the command of the *sthāpaka*.

Placing the cords

19b-21a What is called '*pramāṇa* cord' is determined by the prescribed dimensions (of the intended construction).[13] The *paryanta* cord goes round the outside of that (area determined by the *pramāṇa* cord).[14] The cords which establish (certain placings) such as that of the foundation deposit, those which determine the positions of the gods, those with which the diagram is drawn, all are spoken of as 'determinating' (*vinyāsa*) cords.[15]

21b-22 The foundation deposit for houses is to the south and it is in that direction that the cord must be cast first of all. Then a stake is set into the ground at a distance from the cord equal to the length of the stake; this is (the limit of) the adjustment layer of an entrance or a wall.[16]

23-24a In towns, villages and forts the cord must first of all be cast towards the north-west, then from south to north and east to west, then west to east and north to south.

24b-25 (In a house) the cord which goes from the square of Brahmā[17] towards the east is called *trisūtra*, that going west is called *dhana*, that going south *dhānya* and that which goes from the square of Brahmā towards the north is called *sukha*.[18]

13. *Pramāṇa* designates the reference dimension from which are calculated other dimensions of a building (cf. 9.17-18). It is from the *pramāṇasūtra* (also called *mānasūtra, ājusūtra, ṛjusūtra*) that are calculated the projections of out-going elements such as forepart, ediculae . . . (21.22 . . .). About the precise position of that line see 15.57-60.
14. The *paryantasūtra* is the line which marks the limit of the building and of all its out-going elements.
15. No mention is made of such *vinyāsasūtra* in chapters dealing with foundation deposit (see below 9.101-128 and chapter 12).
16. *Upāna*: "adjustment layer", but the term is used also to designate the plinth which is the lowest moulding of a socle or a base (see chapters 13 and 14).
17. *Brahmasthāna*: the square of Brahmā is the centre of any ground-plan (see 7.33).
18. These cords correspond to the four main buildings (*śālā*) of a house (*catuśśāla*) which are called *sukhālaya, annālaya* (or *mahānasa*), *dhānyālaya* and *dhanālaya* (27.18 sq.).

[35]सुखप्रमाणं यत् सूत्रं तत्प्रमाणमिहोच्यते ।
एकहस्तं द्विहस्तं वा त्रिहस्तं परितोऽधिकम् ॥ २६ ॥
विमानं मण्डपव्यासात् खानयेत् तद्बलार्थकम्[36] ॥ २६½ ॥

[पुनरपच्छाया]

द्व्येकं नो नैकनेत्रे नयनगुणयुगं चाब्धिरुद्राक्षमक्षी[37]
नेत्रैकं नो न चन्द्रं नयननयनकं वह्निवेदाब्धिबाणम्[38] ।
षट्षट्सप्ताष्टकाष्टैर्मुनिरसरसकं भूतवेदाब्ध्यजाक्षं
नेत्रं मात्रं[39] च मेषादिषु दशदशकेऽस्मिन् दिने त्यज्य[40] युञ्ज्यात् ॥ २७ ॥
[41]समीक्ष्य भानोर्गमनं सराशिकं[42]
त्यजेत् पुरोक्ताङ्गुलिमन्त्रयुक्तितः[43] ।
ततस्तु [44]काष्ठादुपगृह्य तद्वशाद्
विसृज्य सूत्रं विदधीत च स्थलम्[45] ॥ २८½ ॥

इति मयमते वस्तुशास्त्रे दिक्परिच्छेदो नाम
षष्ठोऽध्यायः

35. A (var), B (var), E, F : गृहप्रमाणं
36. A, B, C, E : तद्बलार्धकम्
37. A (var) : अक्ष instead of अक्षी
38. A (var), C : वह्निवेदास्थिबाणम्
39. A (var) : मानं
40. A (var), C : त्याज्य
41. A (var) : उदीक्ष्य
42. F : सराशितं
43. A (var), E, F : मात्रयुक्तितः
44. E, F : काष्टामुपगृह्य
45. A (var), E : वस्त्वलम्

26 The *pramāṇa* is the cord which gives the dimension of the *sukha* *(-ālaya)*. For the sake of solidity (the stakes) are to be driven in all around the (central) pavilion at a distance of one, two or three cubits.[19]

The apacchāyā (cont.)

27 (The east-west line) should be established with adjustments of the following numbers of digits for each ten-day period of each month (Aries) two, one, zero, (Taurus) zero, one, two, (Gemini) two, three, four, (Cancer) four, three, two, (Leo) two, one, zero, (Virgo) zero, one, two, (Libra) two, three, four, (Scorpio) four, five, six, (Sagittarius) six, seven, eight, (Capricorn) eight, seven, six, (Aquarius) six, five, four, (Pisces) four, three, two.[20]

28 When the course of the sun has been taken into consideration in relation to the constellations, the indicated adjustment should be made when necessary; this correction once made, the line is drawn from the stake[21] and the ground can be prepared.

Thus ends, in the *Mayamata*, treatise on dwelling,
the sixth chapter: ORIENTATION.

19. The central pavilion of a house is described in chapter 27 (vv. 20-23).
20. This verse (*sragdharā* metre) seems to have been interpolated. It gives a new set of figures for *apacchāyā* (see above vv. 11b-13) which are also found in *Mānasāra* (6.50-77). However both texts while pointing that each figure is to be used for a period of ten days, give the same number for the last ten-day period of a month and for the first of the next one: that seems to indicate that the figures are corresponding to a fortnight . . . .
21. That stake (*kāṣṭha*) must be the gnomon itself.

अथ सप्तमोऽध्यायः[1]

[पदविन्यासः]

वक्ष्येऽहं पदविन्यासं सर्ववस्तुसनातनम् ।

[द्वात्रिंशत् पदानि]

सकलं पेचकं पीठं महापीठमतः परम् ॥ १ ॥
उपपीठमुग्रपीठं स्थण्डिलं नाम चण्डितम् ।
मण्डूकपदकं चैव पदं परमशायिकम् ॥ २ ॥
तथासनं च स्थानीयं देशीयोभयचण्डितम् ।
भद्रं[2] महासनं पद्मगर्भं च त्रियुतं पदम् ॥ ३ ॥
व्रतभोगपदं चैव कर्णाष्टकपदं[3] तथा ।
गणितं पादमित्युक्तं[4] पदं सूर्यविशालकम् ॥ ४ ॥
सुसंहितपदं चैव सुप्रतीकान्तमेव च ।
विशालं विप्रगर्भं च विश्वेशं च ततः परम् ॥ ५ ॥
तथा विपुलभोगं च पदं विप्रतिकान्तकम् ।
विशालाक्षपदं चैव विप्रभक्तिकसंज्ञकम्[5] ॥ ६ ॥
पदं विश्वेशसारं च तथैवेश्वरकान्तकम् ।
[6]इन्द्रकान्तपदं चैव द्वात्रिंशत् कथितानि वै ॥ ७ ॥
सकलं पदमेकं स्यात् पेचकं तु चतुष्पदम् ।
पीठं नवपदं चैव महापीठं द्विरष्टकम् ॥ ८ ॥
पञ्चविंशत्युपपीठं षट्षडेवोग्रपीठकम् ।
स्थण्डिलं सप्तसप्तांशं मण्डूकं चाष्टकाष्टकम्[7] ॥ ९ ॥

1. Chapter missing in D.
2. E : तत्रं
3. F : कर्माष्टकपदं
4. A (var) : इत्येवं instead of इत्युक्तं
5. C : विप्रभक्तिकमङ्घ्रिकम्
6. E : इन्दकान्तपादं
7. C : च द्विकाष्टकम्

Chapter 7

DIAGRAMS[1]

1 Now I give the arrangement of the diagrams suitable for all sites.

The thirty-two diagrams

2-7 The thirty-two diagrams are: *sakala, pecaka, pīṭha, mahāpīṭha, upapīṭha, ugrapīṭha*, one called *sthaṇḍila*,[2] *maṇḍūka, paramaśāyika, āsana, sthānīya, deśīya, ubhayacaṇḍita, bhadramahāsana*,[3] *padmagarbha, triyuta, vratabhoga, karṇāṣṭaka, gaṇita, sūryaviśālaka, susaṃhita, supratīkānta, viśāla, vipragarbha, viśveśa, vipulabhoga, vipratikānta, viśālākṣa, viprabhaktika, viśveśasāra, īśvarakānta* and *indrakānta*.[4]

8-21 The *sakala* consists of one square, the *pecaka* of four, the *pīṭha* of nine and the *mahāpītha* of sixteen; the *upapīṭha* has twenty-five squares,[5] the *ugrapīṭha* thirty-six,[6] the *sthaṇḍila* forty-nine,[7] the *maṇḍūka* sixty-four and the *paramaśāyin* eighty-one;[8] the *āsana* has

1. Cf. *Mānasāra* (chapter 7), *Ajita* (chapter 8) and *Īśānaśiva* (Kriyā. 25.1-6). In the *Mayamata* diagrams are never designated as *yantra* and scarcely as *maṇḍala*; the most common term is *pada* which is applied to the full diagram as well as to its squares (for *caṇḍita* see note 2).
2. *Sthaṇḍilaṃ nāma caṇḍitam*: occasionally *caṇḍita* designates any diagram (like there or 10.16); however it is more often applied to the most common of them, the *maṇḍūka* which has 64 squares (cf. 12.17, 18.129 . . ., *Mānasāra* 7.9 . . .).
3. In the *Mānasāra* there are two diagrams called *bhadra* and *mahāsana*; however as that text omits the *vratabhoga* diagram, it describes thirty-two diagrams like the *Mayamata*.
4. Called *candrakānta* in *Mānasāra* (7.50) (cf. Ms. E of *Mayamata*: *indukānta*).
5. For the five first diagrams of the list see below vv. 22-28.
6. *Ugrapīṭha* diagram is used to establish a temple enclosure with sixteen Attendants' shrines (23.42).
7. *Sthaṇḍila* diagram is used for the second enclosure of a temple (23.5, 45) and for kings' palaces (29.120).
8. For *maṇḍūka* and *paramaśāyin* diagrams see below vv. 30 sq.

[8]परमशायिपदं चैव नन्दनन्दपदं भवेत्[9] ।
आसनं शतभागं[10] स्यादेकविंशच्छतं[11] पदम्[12] ॥ १० ॥
स्थानीयं स्याच्चतुश्चत्वारिंशच्छतपदाधिकम्[13] ।
देशीयं नवषष्ट्यंशं शतं[14] चोभयचण्डितम् ॥ ११ ॥
षण्णवत्यधिकं चैव शतं भद्रं महासनम् ।
[15]सपञ्चविंशद् द्विशतं [16]पद्मगर्भमिति स्मृतम् ॥ १२ ॥
[17]षडाधिक्यं तु पञ्चाशद्द्विशतं त्रियुतं पदम् ।
द्विशतं सनवाशीति व्रतभोगमिति स्मृतम् ॥ १३ ॥
त्रिशतं [18]च चतुर्विंशत् कर्णाष्टकपदं तथा ।
त्रिशतं चैकषष्ट्यंशं गणितं पादसंज्ञितम्[19] ॥ १४ ॥
चतुःशतपदं सूर्यविशालं परिकीर्तितम् ।
सुसंहितपदं चैकचत्वारिंशच्चतुःशतम् ॥ १५ ॥
[20]सवेदाशीतिचत्वारः शतं सुप्रतिकान्तकम् ।
[21]नवविंशत्पञ्चशतं विशालं पदमीरितम् ॥ १६ ॥
षट्सप्ततिः पञ्चशतं विप्रगर्भमिति स्मृतम्[22] ।
[23]विश्वेशं षट्शतं [24]पश्चात् पञ्चविंशत्पदं स्मृतम् ॥ १७ ॥
षट्सप्ततिः षट्शतकं विपुलभोगमिति स्मृतम् ।
[25]नवविंशतिकं सप्तशतं विप्रतिकान्तकम् ॥ १८ ॥
विशालाक्षपदं वेदाशीतिः सप्तशताधिकम्[26] ।
[27]सैकाष्टपञ्चयुक्तं चाष्टशतं विप्रभक्तिकम् ॥ १९ ॥

8. A (var) : परमं शायिकं
9. F : तथा
10. A (var) : शतभाङ्गं
11. C : एकविंशन्मतं
12. E : भवेत्
13. A (var) : पदान्वितम्
14. C : नवषष्ट्याधिकशतम्
15. E, F : सपञ्चपञ्चद्विशतं
16. F : पदं गर्भमिति instead of पद्मगर्भमिति
17. F : षडादिकं
18. A (var), E, F : षट्चातुर्युक्तं; B : सचतुर्युक्तं
19. C : पादसंज्ञकम्
20. A (var) : सवेदाशीतिकं चातुःशतं
21. A (var), E, F : सनन्दपञ्चवेदांशं पञ्चाशतविशालकम् ।
22. E : विपञ्चकोष्ठसमन्वितम् ।
23. E : omits 17b
24. A (var), F : पञ्च पञ्चकोष्ठसमन्वितम् ।
25. A (var), C : नवविंशतिसप्तशतं पदं विप्रतिकान्तकम् ।
26. A (var), E : सप्रशतांशकम् ।
27. C : सैकचत्वाष्टशतं विप्रभक्तमिति स्मृतम् ।

one hundred, the *sthānīya* one hundred and twenty-one,[9] the *deśīya* one hundred are forty-four, the *ubhayacaṇḍita* one hundred and sixty-nine,[10] the *bhadramahāsana* one hundred and ninety-six[11] and the *padmagarbha* two hundred and twenty-five; the *triyuta* has two hundred and fifty-six squares, the *vratabhoga* two hundred and eighty-nine and the *karṇāṣṭaka* three hundred and twenty-four; it is known that the *gaṇita* contains three hundred and sixty-one; it is prescribed that there be four hundred squares in the *sūryaviśāla,* four hundred and forty-one in the *susaṃhita*[12] and four hundred and eighty-four in the *supratikānta*;[13] it is said that the *viśāla* has five hundred and twenty-nine squares, the *vipragarbha* five hundred and seventy-six and the *viśveśa* six hundred and twenty-five; for the *vipula-bhoga* six hundred and seventy-six are prescribed, for the *vipratikānta* seven hundred and twenty-nine, for the *viśālākṣa* seven hundred and eighty-four and for the *viprabhaktika* eight hundred and forty-one; the *viśveśasāra* consists of nine hundred, the *īśvarakānta* of nine hundred and sixty-one[14] and the *indrakānta* of one thousand and twenty-four. This is prescribed by the ancients versed in Tantra.

9. *Sthānīya* diagram is used for the layout of palaces (29.124).
10. *Ubhayacaṇḍita* diagram is used for the third temple enclosure (23.5) and for palaces (29.133).
11. *Bhadramahāsana* diagram is used for the third temple enclosure (23.3).
12. *Susaṃhita* diagram is used for the layout of the fourth temple enclosure (23.5).
13. *Supratikānta* is a metrical variant of *supratīkānta* (v. 6); diagram used for the fourth temple enclosure (23.3).
14. *Īśvarakānta* (or *Īśakānta*) and *Indrakānta* diagrams are used for the layout of the fifth temple enclosure (23.3 and 6).

विश्वेशसारमित्युक्तमेवं नवशतं पदम्[28] ।
[29]सैकषष्ट्यां नवशतं पदमीश्वरकान्तकम् ॥ २० ॥
[30]चतुर्विंशतिसंयुक्तं सहस्रपदसंकुलम् ।
इन्द्रकान्तमिति प्रोक्तं तन्त्रविद्भिः पुरातनैः ॥ २१ ॥

[सकलम्]

आद्यं पदं सकलमेकपदं[31] यतीना-
मिष्टं हि विष्टरमहाशनवह्निकार्यम्[32] ।
[33]पित्र्यामरादियजनं गुरुपूजनं च
[34]भान्वार्कितोयशशिनामकसूत्रयुक्ते ॥ २२ ॥

[पेचकम्]

पैशाचभूतसविषग्रहरक्षकास्ते[35]
पूज्या हि पेचकपदे चतुरंशयुक्ते[36] ।
तस्मिन् विधेयमधुना[37] विधिना विधिज्ञैः
शैवं तु निष्कलमलं[38] सकलं च युक्त्या ॥ २३ ॥

[पीठम्]

[39]अथ पीठपदे नवभागयुते
दिशि दिश्यथ वेदचतुष्टयकम् ।
[40]विदुरीशपदाद्युदकं दहनं
गगनं पवनं पृथिवी ह्यबहिः ॥ २४ ॥

[महापीठम्]

षोडशांशं महापीठं पञ्चपञ्चामरान्वितम् ।
[41]ईशो जयन्त आदित्यो भृशोऽग्निर्वितथो यमः ॥ २५ ॥

28. A (var) : एकत्रवशतंपदम्; E : एतन्नवशतांशकम्
29. A (var), E : सैकषष्ट्यधिकं नन्दशतमीश्वरकान्तकम् ।
30. A (var), C : चतुर्विंशत्सहस्रं त्विन्द्रकान्तपदं स्मृतम् ।
31. A (var) एकमिदं instead of एकपदं
32. E, F : विष्टरमिहासनवह्निकार्यम् ।
33. F : पित्रामनादियजनं
34. E : भान्वर्कतोय-; A (var) : भानुत्रितोय
35. E : राक्षकास्ते
36. A (var), C : चतुरङ्गयुक्तो
37. F: तस्मिन्नाययाधुना
38. E : निष्कलपदं
39. F : महापीठपदे
40. A (var), C, E, F : विदिग्
41. F : अंशौ

The sakala diagram[15]

22 The basic diagram is the *sakala* consisting of only one square; it is favourable for ascetics and for a fire which consumes a great deal of spread *darbha* grass; it is suitable for sacrifices to *Pitṛ* and to the immortals as well as for the worship of the guru; the four lines which border it are called: Bhānu, Ārkin, Toya and Śaśin.

The pecaka diagram

23 In the four squares of the *pecaka* diagram are to be honoured the Paiśāca, Bhūta, Viṣagraha and Rakṣaka; it is here that those who know the rules are to install the symbol or the image of Śiva[16] according to the general rules and specific conditions.

The pīṭha diagram[17]

24 It is known of the *pīṭha* diagram, which consists of nine squares, that the four Vedas are at the four cardinal points and that Water, Fire, Ether and Wind are (at the intermediate points of which) the first is the north-east; in the centre is Earth.

The mahāpīṭha diagram[18]

25-27 The *mahāpīṭha* diagram consists of sixteen squares occupied by twenty-five divinities. The divinities on the periphery are: Īśa, Jayanta,

15. Diagrams *sakala, pecaka* and *pīṭha* are described in *vasantatilakā* verses and form a special group unconnected with *vāstupuruṣa* myth (see below).
16. *Śaivaṃ tu niṣkalam alaṃ sakalaṃ ca*: the well-known definition of the two kinds of representations will be found in chapter 33 (vv. 1 sq.).
17. *Pīṭha* diagram (Fig. 2, p. XLVI) is used for establishing the plan of *svastika* villages (9.43), of the first temple enclosure (23.4, 39) and of kings' palaces (29.113); it can also serve for the foundation deposit casket (9.106).
18. *Mahāpīṭha* diagram (Fig. 3, p. XLVII) is used for establishing the plan of the first temple enclosure (23.2). The gods listed here are those who are in charge of keeping the *vāstupuruṣa* flat on the ground; a longer list is given below (vv. 34 sq.).

भृङ्गश्च पितृसुग्रीवौ[42] वरुणः शोषमारुतौ[43] ।
मुख्यः सोमोऽदितिश्चेति बाह्यदेवाः प्रकीर्तिताः ॥ २६ ॥
आपवत्सार्यसावित्रा[44] विवस्वानिन्द्रमित्रकौ ।
[45]रुद्रजो भूधरश्चान्तर्मध्ये ब्रह्मा स्थितः प्रभुः[46] ॥ २७ ॥

[उपपीठादि]

तत्पार्श्वयोर्द्वयोरेकभागेनैकेन वर्धनात् ।
उपपीठं भवेदत्र देवतास्ताः पदे[47] स्थिताः ॥ २८ ॥
तत्तत्पार्श्वद्वयोश्चैवमेकैकांशविवर्धनात् ।
इन्द्रकान्तपदं यावत् तावद् युञ्जीत बुद्धिमान् ॥ २९ ॥
समानि यानि भागानि[48] चतुःषष्टिवदाचरेत्[49] ।
[50]असमान्यपि सर्वाणि चैकाशीतिपदोक्तवत्[51] ॥ ३० ॥
[52]पदानामपि[53] सर्वेषां मण्डूकं चापि तत्परम् ।
चण्डितं सर्ववस्तूनामाहत्यं च यतस्ततः ॥ ३१ ॥
तस्मात् संक्षिप्य तन्त्रेभ्यो वक्ष्येऽहमपि तद् द्वयम् ।
[54]चतुःषष्टिपदे चैकाशीतौ सकलनिष्कले ॥ ३२ ॥
सूत्रे च पदमध्ये च ब्रह्माद्याः स्थापिताः सुराः ।
प्रागुदग्दिक्समारभ्यैवोच्यन्ते देवताः पृथक्[55] ॥ ३३ ॥

[देवतस्थानानि]

ईशानश्चैव पर्जन्यो जयन्तश्च महेन्द्रकः ।
आदित्यः सत्यकश्चैव भृशश्चैवान्तरिक्षकः[56] ॥ ३४ ॥

42. E : सुग्रीवो
43. F : शोषकारितौ
44. C, E, F : सवित्री
45. E : रुद्रजौ
46. F : प्रभः
47. A (var), B : देवतास्ततपदे; E : देवतास्यपदे
48. A (var) : गर्भाणि pour भागानि
49. A (var), E, F : चतुःषष्टिवदिष्यते; C : चतुःषष्टिपदाचरेत्
50. A (var) : अन्यान्यपि च ;
51. F : चैकाशीतिवदिष्यते; A (var) : चैकाशीतिवदीरितम्
52. F : omits 31b-32a
53. A (var) : अथ अपि
54. C : omits 32b-33a
55. E : क्रमात्
56. F : चैवान्तरिक्षतः

Āditya, Bhṛśa, Agni, Vitatha, Yama, Bhṛṅga, Pitṛ, Sugrīva, Varuṇa, Śoṣa, Marut, Mukhya, Soma and Aditi; those of the interior are Āpavatsa, Ārya, Savitṛ, Vivasvant, Indra, Mitra, Rudraja and Bhūdhara; in the centre is Brahmā, the Lord.

The upapīṭha and following diagrams

28-29 The *upapīṭha* diagram[19] in which each of those deities occupies a square is obtained by adding one unit to both the dimensions of (the *mahāpīṭha* diagram). Thus the sage, adding a unit to each of the dimensions every time, may determine (all the diagrams) up to *indrakānta*.

30-32a When the number of squares is even the arrangement should be as that of the sixty-four square diagram; when the number is uneven it must be as that of the eighty-one square diagram. Amongst the diagrams the *maṇḍūka* is the one which should be used for all constructions. That is why, having drawn upon the Tantra, I am going to describe these two diagrams.[20]

32b-33a In the sixty-four and eighty-one square diagrams, one being even and the other odd, the gods, of whom the first is Brahmā, are installed on the periphery and in the centre.[21]

Positions of the gods[22]

33b-37 Now the gods are presented consecutively starting with (he who rules the) north-east corner: Īśa, Parjanya, Jayanta, Mahendraka, Āditya,

19. *Upapīṭha* diagram (Fig. 4, p. XLVIII) is used for making the foundation deposit casket (9.107, 12.15a), for the ceremony marking the completion of the temple (18.132, 172) and for establishing a temple enclosure with twelve Attendants' shrines (23.40).

20. That is to say the *maṇḍūka* and the *paramaśāyika* diagrams (Figs. 5 and 6, p. XLIX and L).

21. One may also understand that deities are to be placed in the squares (*padamadhye*) or on the lines (*sūtre*) dividing the diagram according to it being even or odd (*sakalaniṣkale*); however it seems that lines are to be avoided when placing the gods (7.49).

22. The names given here are used all over the text to locate buildings or parts of them on ground plans. It is very rare that the shrine of any god be placed on the square specific to that god (see 9.66 sq. or 23.39 sq.).

अग्निः पूषा च वितथो राक्षसश्च यमस्तथा ।
[57]गन्धर्वो भृङ्गराजश्च मृषश्च[58] पितृदेवताः ॥ ३५ ॥
दौवारिकश्च सुग्रीवः पुष्पदन्तो जलाधिपः ।
असुरः शोषरोगौ[59] च वायुर्नागस्तथैव च ॥ ३६ ॥
मुख्यो[60] भल्लाटकश्चैव सोमश्चैव मृगस्तथा ।
[61]अदितिश्चोदितिश्चैव द्वात्रिंशद् बाह्यदेवताः ॥ ३७ ॥
आपश्चैवापवत्सश्चैवान्तः प्रागुत्तरे स्मृतौ[62] ।
सविन्द्रश्चैव साविन्द्रश्चान्तः प्राग्दक्षिणे स्मृतौ[63] ॥ ३८ ॥
इन्द्रश्चैवेन्द्रराजश्च दक्षिणापरतः स्थितौ ।
रुद्रो रुद्रजयश्चैव पश्चिमोत्तरतो दिशि ॥ ३९ ॥
ब्रह्मा मध्ये स्थितः शम्भुस्तन्मुखस्थाश्चतुःसुराः ।
आर्यो विवस्वान् मित्रश्च[64] भूधरश्चैव कीर्तिताः ॥ ४० ॥
चरकी च विदारी[65] च पूतना पापराक्षसी[66] ।
ईशानादि बहिः स्थाप्याश्चतुष्कोणे स्त्रियः स्मृताः ॥ ४१ ॥
नपदा बलिभोक्तारः[67] शेषाणां पदमुच्यते [68] ।
विंशत्सूत्रैः सन्धिभिः सप्तवेदैः[69]
षट्षट्संख्याभिश्चतुष्कैश्च षट्कैः ।
[70]अर्कैः शूलैर्वेदसंख्याः सिराभिः
संयुक्तं स्यादष्टकेनैकमेतत् ॥ ४२ $\frac{१}{२}$ ॥

[मण्डूकपदम्]

चतुःषष्टिपदे मध्ये ब्रह्मणश्च चतुष्पदम् ॥ ४३ ॥

57. F : गन्धर्वे
58. E : मृशश्च
59. E : शोषरोगाः
60. F : मूल्ये
61. E : अदितिश्चदितिश्चैव
62. F : स्थितौ
63. A (var), F : मतौ
64. F : चित्रश्च
65. E : वितारी
66. F : पापराक्षसि
67. A (var), C, E : बलिभोक्ता च
68. E : इष्यते
69. C : सप्तभेदैः
70. A : युक्तैः

Satyaka, Bhṛśa, Antarikṣa, Agni, Pūṣan, Vitatha, Rākṣasa, Yama, Gandharva, Bhṛṅgarāja, Mṛṣa, the Pitṛ deities,[23] Dauvārika, Sugrīva, Puṣpadanta, Jalādhipa, Asura, Śoṣa, Roga, Vāyu, Nāga, Mukhya, Bhallāṭaka, Soma, Mṛga, Aditi and Uditi, these are the thirty-two exterior divinities.

38-39 Āpa and Āpavatsa are both inside, at the north-east corner; Savindra and Sāvindra are inside at the south-east;[24] Indra and Indrarāja at the south-west, Rudra and Rudrajaya at the north-west.

40 Brahmā stays in the centre; he is Śambhu and, facing him, are four gods named Ārya, Vivasvant, Mitra and Bhūdhara.

41 The female deities, Carakī, Vidārī, Pūtanā and Pāparākṣasī are on the outside of the four corners and are installed starting from the north-east.

42 Such eaters of oblations who have no regular positions are to be placed in those of the other divinities. With twenty lines, twenty-eight intersections, four stakes and four diagonals the result is thirty-six, twenty-four, twelve, eight and one squares(?).[25]

The maṇḍūka diagram (fig. 5)

43-47a There are four squares for Brahmā in the centre of the sixty-four square diagram; the four gods, starting with Ārya, each have a three (square) position and are set up starting from the east; the eight

23. *Pitṛdevatāḥ*: Pitṛ is most generally in the singular as a name of Nirṛtti.

24. Savindra and Sāvindra are often called Savitṛ and Sāvitṛ.

25. That verse (*triṣṭubh śālinī*) seems to refer to *paramaśāyika* diagrams (with ninety-one squares); cf. chapter 27 note 14.

[71]आर्यकादिचतुर्देवाः प्रागादित्रित्रिभागिनः ।
[72]आपाद्यष्टामराः कोणेष्वर्धार्धपदभागिनः[73] ॥ ४४ ॥
महेन्द्राक्षसाद्याश्च पुष्पभल्लाटकादयः[74] ।
दिशि दिश्यथ चत्वारो देवा द्विपदभोगिनः ॥ ४५ ॥
जयन्तश्चान्तरिक्षश्च वितथश्च मृषस्तथा[75] ।
सुग्रीवो रोगमुख्यश्च दितिश्चैकैकभागिनः ॥ ४६ ॥
[76]ईशाद्यष्टामराः शेषाः कोणेष्वर्धपदेश्वराः ।
एवं क्रमेण भुञ्जीरन्[77] मण्डूके वास्तुदेवताः ॥ ४७ ॥
स्वस्वप्रदक्षिणवशात् पदभुक्तिक्रमं विदुः ।
ब्रह्माणं च निरीक्ष्यैते स्थिताः स्वस्वपदेऽमराः ॥ ४८ ॥

[वास्तुपुरुषविधानम्]

षड्वंशमेकहृदयं चतुर्मर्मं चतुःसिरम् ।
मेदिन्यां वास्तुपुरुषं निकुब्जं प्राक्शिरं[78] विदुः ॥ ४९ ॥
तस्योत्तमाङ्गं विज्ञेयमार्यको नाम देवता ।
सविन्द्रो[79] दक्षिणभुजः साविन्द्रः[80] कक्षमुच्यते ॥ ५० ॥
[81]आपश्चैवापवत्सश्च सकक्षो वामतो भुजः ।
विवस्वान् दक्षिणं पार्श्वं वामपार्श्वं महीधरः ॥ ५१ ॥
मध्ये ब्रह्ममयः कायो मित्रः[82] पुंस्त्वं विधीयते ।
इन्द्रश्चैवेन्द्रराजश्च दक्षिणः पाद ईरितः[83] ॥ ५२ ॥
रुद्रो रुद्रजयो वामपादः शेते त्वधोमुखः ।
[84]वस्तुत्रिभागमध्ये तु वंशाः षट् प्रागुदङ्मुखाः ॥ ५३ ॥ ।

71. F : सूर्यकादि
72. E : आपाद्यष्टासुराः
73. A (var) : भोगिनः
74. F : पुष्पमल्लाटकन्तया
75. A, B, C, F : मृगस्तथा (cf. supra *śl.* 35)
76. F : ईशान्यष्टामराः कोणेष्वर्धपदभोगिनः
77. C : भुज्यन्ते; F : भुञ्जिते
78. E, F : प्राक्शिरो
79. A (var) : सवित्रो
80. A (var) : सावित्रः
81. E : आपस्तथापवत्सश्च
82. E : मित्रं
83. E : दक्षिणं पदमीरितम्
84. E : वस्त्रत्रिभागमध्ये

immortals of whom the first is Āpa are situated in the corners, on a half square; at each cardinal point there are four gods occupying two squares: Mahendra (. . . etc. at the east), Rākṣasa (. . . etc. at the south), Puṣpa(-danta . . . at the west) and Bhallāṭa (. . . etc. at the north). Jayanta, Antarikṣa, Vitatha, Sugrīva, Roga, Mukhya and Diti[26] each occupy one square; the eight remaining deities, the first of whom is Īśa, rule at the corners, each occupying half a square.

47b-48 The site's divinities should be installed in this order on the *maṇḍūka* diagram; it is known that the order for the awarding of places is in accordance with the *pradakṣiṇa,* therefore, the immortals are to be installed, each in his place, facing Brahmā.[27]

The Spirit of the building[28]

49 It should be known that the Spirit of the building has six bones (or lines), a single heart, four vulnerable points and four vessels (or diagonals) and that he lies upon the ground, his head towards the east.[29]

50-54 It is said that the divinity named Ārya is his head, that Savindra is his right arm and Sāvindra his (right) hand, that Āpa and Āpavatsa are his left arm and (left) hand, that Vivasvant is his right side and Mahīdhara his

26. Above that deity is called Uditi (v. 37).

27. Thus the gods of the diagram are alike the Attendant deities surrounding Śiva and facing him (e.g. *Ajita* 39.6 or *Raurava* Kriyā. 33.3).

28. Vāstupuruṣa: see *Ajita* 8.1 sq., *Matsyapurāṇa* chapter 252. For an interpretation, see Kramrisch 1946 vol. I, pp. 67 sq.

29. The head of Vāstupuruṣa is often placed towards the north-east (e.g. *Prāsādamaṇḍana* p. (164); about *vaṃśa* ('bone' of the *Vāstupuruṣa* or 'north-south line' of the diagram), *marma* ('vulnerable point') and *sirā* ('diagonal of the diagram'), see below chapter 27 note 14.

वस्तुमध्ये तु मर्माणि ब्रह्मा हृदयमुच्यते ।
[85]निष्कूटांशाः सिरा ज्ञेया इत्येष पुरुषः स्मृतः ॥ ५४ ॥
गृहे गृहे मनुष्याणां शुभाशुभकरः स्मृतः[86] ।
[87]तस्याङ्गानि गृहाङ्गैश्च विद्वान् नैवोपपीडयेत् ॥ ५५ ॥
व्याधयस्तु यथासंख्यं भर्तुरङ्गे[88] तु संश्रिताः ।
[89]तस्मात् परिहरेद् विद्वान् पुरुषाङ्गं तु सर्वथा ॥ ५६ ॥

[पुनर्मण्डूकपदम्]

[90]चत्वारिंशच्च पञ्चैते देवतानां समुच्चयः ।
[91]अष्टाष्टांशे कस्य धस्तन्मुखाना-
मिष्टं गांशं व्यञ्जनं षोडशानाम् ।
अष्टानां कः[92] षोडशानां खभागं[93]
मण्डूकाख्ये स्थण्डिले तैतिलेषु[94] ॥ ५७ ॥

[परमशायिपदम्]

परमशायिपदे नवभागभाक्
कमलजो मुखतस्तु[95] चतुःसुराः ।
[96]रसपदा द्विपदा हि विदिक्स्थिता
बहिरथैकपदाः सकलामराः ॥ ५७½ ॥

इति मयमते वस्तुशास्त्रे पददेवताविन्यासो[97] नाम
सप्तमोऽध्यायः

85. F : निष्कटाशाः
86. E : शुभाशुभकरप्रदा
87. F : तस्याङ्गेनिग्रहांश्च पीढयेत्सर्वनाशनम् ।
88. E : भित्तिरङ्गे
89. F : तस्मात् सर्वप्रयत्नेन विद्वन्नेवोपपीठयेत् ।।
90. End of chapter is missing in F
91. E : अष्टाष्टांशेकस्य क्वस्तकस्तयुखानामिष्टाङ्गानां व्यञ्जनं षोडशानाम् ।
92. E : omit कः
93. C : स्वभागं
94. C : तत् त्रिलेषु
95. C : मुखदस्तु
96. C : रसपदाद्युपदापि विदिक्स्थिता
97. A (var) : पदविन्यासो

left, that in the middle his trunk is Brahmā, that his testicles are Mitra, that his right foot (and leg) are Indra and Indrarāja and his left foot (and leg) are Rudra and Rudrajaya. He rests with his face to the ground; his six bones, orientated to the east and north, are in the middle of the (central) parts of the site.[30] In the centre of the site are found the vulnerable points and the heart which is Brahmā and it is from there that the veins (or diagonals) start. Thus the Spirit is described.

55-56 It is known that it is He who, in every human dwelling, is responsible for good and for bad fortune, that is why the wise must avoid tormenting His limbs with the 'limbs' of the house for, if not, sorrows innumerable will fall upon the limbs of the owner of the house. Thus the sage must always spare the body of the Spirit (in the course of construction).[31]

The maṇḍūka diagram (cont.)[32]

57 There are forty-five gods in all in the sacrifical layout named *maṇḍūka*, which consists of sixty-four squares: Ka[33] (occupies) four squares, those facing him three each, sixteen (gods) a half square,[34] eight (gods) one, and sixteen (gods), two.

The paramaśāyin diagram (Fig. 6)

58 Kamalaja occupies nine squares in the *paramaśāyin* diagram, the four gods facing him, six each, those who hold the intermediate points two,[35] and all those of the periphery, one.

Thus ends, in the *Mayamata*, treatise on dwelling, the seventh chapter: ARRANGEMENT OF THE GODS IN DIAGRAMS.

30. They are probably the nine central squares of the *paramaśāyika* diagram.
31. See 9.86 for prescriptions regarding settlements.
32. Verses 57 and 58 are in *triṣṭubh ṣālinī* metre.
33. Ka is Brahmā; *katapayādi* system of numbering is used throughout this verse.
34. *Vyañjana*: 'letter', that is to say the 'half' of a syllable.
35. Those who hold the intermediate points are Āpa, Āpavatsa . . . etc.

अथाष्टमोऽध्यायः[1]

[बलिकर्म]

देवानां स्वपदस्थानां[2] बलिकर्म विधीयते ।
सामान्याहत्यमार्गेण[3] ब्रह्मादीनां यथाक्रमम् ॥ १ ॥

[आहत्यबलिः]

गन्धमाल्यैश्च धूपेन पयसा[4] मधुसर्पिषा ।
पायसौदनलाजैश्च ब्रह्मस्थानं समर्चयेत् ॥ २ ॥
आर्यके फलभक्ष्यं[5] स्यान्माषान्नं[6] च तिलानि च ।
विवस्वति विनिक्षिप्तं दधि दूर्वा[7] च मित्रके[8] ॥ ३ ॥
[9]महीधरे भवेद् दुग्धमेवमन्तर्बलिः स्मृतः[10] ।
पर्जन्यस्याज्यमैन्द्रस्य[11] नवनीतं[12] सपुष्पकम्[13] ॥ ४ ॥
[14]इन्द्रे कोष्ठं च पुष्पं [15]च मधु कन्दाश्च भास्करे[16] ।
सत्यके मधुकं दद्याद् भृशाय[17] नवनीतकम् ॥ ५ ॥
माषं रजनिचूर्णं च गगनस्य बलिं ददेत्[18] ।
दुग्धाज्यं तगरं[19] वह्नेः शिम्बान्नं[20] पूष्णि[21] पायसम् ॥ ६ ॥
[22]कङ्क्वन्नं वितथे[23] शीधु[24] राक्षसे बलिरिष्यते ।
[25]शिम्बान्नं कृसरं याम्ये गन्धर्वेऽखिलगन्धकम् ॥ ७ ॥

1. Chapter missing in D
2. F: च पदस्थानं
3. E : सामान्याहन्यमार्गेन
4. F : पयसो
5. E : फलभक्षं
6. F : मासानं
7. E : पर्वा
8. C : मिश्रेकैः; F : मिश्रके
9. F : महीघरे पदे दुग्धमेवमन्त्रबलि यतः ।
10. E : क्षिपेत्
11. E : इन्द्रस्य instead of ऐन्द्रस्य
12. F : नयनीतं
13. E : सपुष्पकं
14. A (var), E, F : इन्द्रकोष्ठं
15. E : पिष्टं instead of पुष्पं
16. C : भाष्वरे
17. A (var), C : दद्यादौशाय
18. A (var) : यजेत्
19. A (var), C, E, F : तकरं
20. A (var) : शिखान्नं; C : शिवान्नं
21. E : पुष्ण
22. Correct. edit A; A, C : कक्वन्नं; E : कृत्वान्नं; F : कक्षान्नं
23. E : विघते
24. A, B, F : शीथु; E : शीतं
25. C : शिवान्न

CHAPTER 8

OFFERINGS[1]

1 It is prescribed that offerings should be made to each god in his own place; individual and common offerings are made starting with that to Brahmā.[2]

Individual offerings

2-4a The place of Brahmā is to be honoured with perfumes and garlands, incense, milk, honey and ghee, rice boiled in milk and roasted rice. The offering at the place of Āryaka is a cake of fruits as well as cooked beans and sesame seeds. Curd is prescribed for Vivasvant, *dūrvā* grass for Mitra and for Mahīdhara, milk. These are the offerings to the (gods) of the interior.[3]

4b-7 (At the place of) Parjanya the offering should be clarified butter and at that of Aindra,[4] fresh butter and flowers. Entrails and flowers are the offerings for Indra,[5] honey and onions for Bhāskara and, for Satyaka, honey. Fresh butter is offered to Bhṛśa; the offering to Gagana is beans and orpiment, that to Vahni, milk, ghee and *tagara* powder and the offering to Pūṣan is vegetables and milk. An offering of cooked *kaṅku* is prescribed for Vitatha, one of intoxicating juice for Rākṣasa, of vegetables and boiled rice for Yama and, for Gandharva, an offering of pure perfume.

1. Cf. *Mānasāra* (chapter 8), *Ajita* (chapter 8) and *Matsyapurāṇa* (chapter 258).
2. *Sāmānyābatyamārgeṇa* (see below *sādhāraṇabali, viśeṣabali*): the offerings of the two kinds are to be done in any case according to this chapter. According to *Mānasāra* (8.16) common offerings are prescribed for temple sites and individual ones for village sites (*devālayārthaṃ sāmānyaṃ grāmārthaṃ tu viśeṣakam*).
3. That is to say the gods of which the squares are not along the diagram limit line.
4. Aindra is Jayanta (son of Indra).
5. Elsewhere Indra is always called Mahendra.

भृङ्गराजेऽब्धिमत्स्यः स्यान्मृषे[26] मत्स्यौदनं[27] विदुः ।
निर्ऋतौ तैलपिण्याकं[28] बीजं दौवारिके बलिः ॥ ८ ॥
सुग्रीवे मोदकं[29] पुष्पदन्तके[30] पुष्पतोयकम् ।
[31]वरुणे पायसं धान्यं[32] शोणितेनासुरे बलिः ॥ ९ ॥
सतिलं तण्डुलं शोषे रोगे स्याच्छुष्कमत्स्यकम्[33] ।
[34]स्विन्नं[35] हारिद्रकं[36] वायौ नागे मद्यं च लाजकम् ॥ १० ॥
[37]धान्यचूर्णं हि मुख्यस्य[38] दधि सर्पिश्च सम्मतम् ।
[39]गुलौदनं तु भल्लाटे सोमे दुग्धौदनं[40] ददेत्[41] ॥ ११ ॥
शुष्कमांसं मृगे दद्याद् देवमातरि[42] मोदकम्[43] ।
उदितौ तिलभक्ष्येण क्षीरान्नं सर्पिरीशके ॥ १२ ॥
लाजं धान्यं सविन्द्रस्य[44] साविन्द्रे[45] गन्धतोयकम् ।
[46]बस्तमेदस्तथा मुद्गचूर्णमिन्द्रेन्द्रराजयोः ॥ १३ ॥
[47]रुद्रे रुद्रजये मांसं स्विन्नमापापवत्सयोः ।
[48]कुमुदं मत्स्यमांसं च शङ्खकच्छपमांसकम् ॥ १४ ॥
मद्यमाज्यं चरक्यास्तु विदार्या लवणो बलिः ।
[49]पूतनायास्तिलं पिष्टमन्याया मुद्गसारकम् ॥ १५ ॥

26. E : मापे for मृषे
27. C : मत्स्यादनं
28. A (var), C : तैलपिण्डान्नं
29. E : गोदकं
30. C, E : पुष्पं दन्तके
31. F : बरुणो
32. F : लाजं instead of धान्यं
33. F : मंसकम् instead of मत्स्यकम्
34. F : omits 10b-12a.
35. A (var) et C : स्वीनं
36. C : हरिद्रुतं
37. A (var) : रात्रिचूर्णं
38. E : मुख्यं स्याद्
39. C : गुडोदनं
40. E : शुद्धोदनं
41. A (var) : यजेत्
42. F : देवमातुर
43. C : सोदकम्; E : मोदकैः
44. A (var) : सवित्रस्य
45. A (var) : सावित्रे; C : साविन्द्र-
46. E : लब्धमोदस्तथा मुद्गं चूर्णमिन्द्रेन्द्रराजयोः
47. E : omits 14.
48. F : कमुदं
49. F : omits 15-16.

8-12 Sea fish is offered to Bhṛṅgarāja and rice with fish to Mṛṣa. A sesame oil cake is offered to Nirṛti[6] and a seed (of sesame) to Dauvārika, a cake is offered to Sugrīva and, to Puṣpadanta, flowers and water. Rice and milk is the offering intended for Varuṇa and, for Asura, blood. The offering to Śoṣa should be rice with sesame, to Roga, dried fish, to Vāyu, fat and orpiment and to Nāga, wine and roasted rice. Flour, curds and ghee should be offered to Mukhya, to Bhallāṭa, cooked rice with molasses and, to Soma, milk rice. Dried meat is to be offered to Mṛga, cake to the Mother of the gods,[7] sesame rice to Uditi and rice and ghee to Īśaka.

13-14 Roasted rice is required for Savindra and perfumed water for Sāvindra, for Indra and Indrarāja, goat's fat and crushed beans, for Rudra and Rudrajaya, meat and fat and, for Āpa and Āpavatsa, lotus and the flesh of shellfish and tortoise.

15 The offering to Carakī is wine and roasted rice, to Vidārī it is salt, to Pūtanā, *piṣṭa*[8] and, to the last (who is Pāparākṣasī), bean water.

The common offering

16-17 All the gods in succession should then be presented with the common offering which consists of pure food with ghee and curds and

6. Elsewhere Pitṛ.
7. Aditi is the 'mother of the gods'.
8. *Piṣṭa*: a mixture of flour, grated coconut and sugar.

[साधारणबलिः]

साधारणबलिः[50] शुद्धभोजनं सघृतं दधि ।
सर्वेषामपि देवानां गन्धादीनि ददेत् क्रमात्[51] ॥ १६ ॥
कन्यका वाऽथ वेश्या वा बलिधारणयोग्यकाः ।
अङ्गन्यासकरन्यासैः पूतचेता[52] यथाक्रमम् ॥ १७ ॥
ओङ्कारादिनमोन्तेन स्वस्वनामाभिधाय च ।
दत्वा पूर्वं जलं[53] पश्चात् साधारणबलिं ददेत् ॥ १८ ॥
[54]तत्तद्योग्यबलिं पश्चाद् देयं[55] तोयं तथा[56] बुधैः ।
ग्रामादीनां तु मण्डूकपदे[57] परमशायिके ॥ १९ ॥
सन्तर्प्य देवता ह्येवं पूर्वोक्तविधिना क्रमात्[58] ।
विसर्जयेत् ततो देवान् विन्यासार्थं तु मन्त्रवत्[59] ॥ २० ॥
ब्रह्माणं बाह्यदेवांश्च तत्तदुक्तपदे[60] न्यसेत् ।
[61]देवालयविधानार्थं द्वारार्थं[62] ते प्रकीर्तिताः ॥ २१ ॥
शेषाश्च निष्पदाः सर्वे रक्षार्थं[63] तु निवेशिताः ।
एवं ग्रामादिषु प्रोक्तं रहस्यमिदमीरितम् ॥ २२ ॥
कृतोपवासः स्थपतिः प्रभाते[64]
विशुद्धदेहोऽविकलं[65] गृहीत्वा ।
विशेषसामान्यबलिं सुराणां
यथोक्तनीत्या विदधीत सम्यक् ॥ २३ ॥

इति मयमते वस्तुशास्त्रे बलिकर्मविधानो नाम
अष्टमोऽध्यायः

50. E : सादारणबलिं
51. A (var) : यजेत् क्रमात्; E : यथा क्रमात्
52. E : पतचेतो
53. F : पूर्वजलं
54. A (var) : adds between 18 and 19.
हृदयाय नमस्तेऽस्तु साधारणबलिं ददेत् ।
55. F : दयं
56. C : ततो
57. E : मण्डूकं पते
58. E : पूर्वस्तविधिना क्रमात्
59. A (var), F : मन्त्रवित्
60. F : पदं
61. E : gap up to verse 124 of chapter 9.
62. A (var), C : राजार्थं
63. C : नरार्थं
64. A (var), F : प्रसन्नो
65. C : देहीविकलं; F : देहोविमलं

of perfumes (etc.). A young girl or a courtesan should be called to carry the offerings; she will first have purified her mind by means of impositions on limbs and hands.

18-19 After each deity has been hailed by name with a formula beginning 'OM' and ending 'NAMAS' and after water has been offered, the common offering should be made and then that appropriate to each god; next water is again offered. It is thus that the sages proceed at the time of the founding of villages and other settlements, using *maṇḍūka* or *paramaśāyin* diagrams.[9]

20 The gods being appeased thus one after the other, according to the ritual, they should be dismissed with a formula in order that the layout of the construction may be set up.

21-22a Brahmā and the exterior deities are to be installed, each in his place; (their positions) are intended for temples and gateways.[10] The others, and all those without specific positions, are assigned to protect the site.[11]

22b The secret ritual pertaining to villages . . . etc. has thus been revealed.

23 At dawn, the architect, having fasted, purified his mind and understood all things, must apportion amongst the gods the common and particular offerings according to the rules given above.

Thus ends, in the *Mayamata,* treatise on dwelling,
the eighth chapter: RULES FOR OFFERINGS.

9. See 7.30 sq.
10. See 9.57 sq.
11. 8.22a = 27.75a.

अथ नवमोऽध्यायः[1]

[ग्रामविन्यासः]

ग्रामादीनां मानं विन्यासं चापि वक्ष्यते विधिना ।

[पुनर्मानोपकरणम्]

दण्डानां पञ्चशतं क्रोशं[2] तद्द्विगुणमर्धगव्यूतम्[3] ॥ १ ॥
गव्यूतं तद्द्विगुणं ह्याष्टसहस्रं[4] तु योजनं विद्यात्[5] ।
अष्टधनुश्चतुरश्रा काकणिका तच्चतुर्गुणं माषम् ॥ २ ॥
माषचतुर्वर्तनकं[6] तत्पञ्चगुणं हि वाटिका कथिता[7] ।
वाटिकया युगगुणिता ग्रामकुटुम्बावनिः श्रेष्ठा[8] ॥ ३ ॥
एवं भूगतमानं दण्डैस्तेषां तु वक्ष्यते मानम् ।

[ग्रामादिमानम्]

ग्रामस्य शतसहस्रैर्दण्डैः पर्यन्तमानमिदमुक्तम्[9] ॥ ४ ॥
विंशतिसहस्रदण्डात् तत्समवृद्ध्या तु पञ्चमानं स्यात् ।

1. Chapter missing in D. F : omits verses 1 to 124.
2. C : क्रौशम् ; F : तोशं
3. F : तद्द्विगुणमध्यगव्यूतम्
4. C, F : द्व्यष्टसहस्रं
5. C : दद्यात्
6. F : वक्तनकं for वर्तनकं
7. F : विटिका कर्मिता
8. C : वनिश्रष्ठा
9. F : उदितम्

CHAPTER 9

VILLAGES PLANNING[1]

1a Now the dimensions and plans for villages and other settlements are set out according to the rule.

The system of measurements (cont.)

1b-2a It is to be known that five hundred poles (*daṇḍa*) make one *krośa* twice of which is half a *gavyūta* and twice that is a *gavyūta*; eight thousand poles are one *yojana*.[2]

2b-4a A square, eight poles square, is a *kākaṇī*; four times that is a *māṣa*, four times which is a *vartanaka*; five times one *vartanaka* is a *vāṭakā*[3] whose quadruple is the area precisely suitable for a family plot in a

1. *Grāmavinyāsa*: in this chapter (as elsewhere in the text) *grāma* is used as a specific term applied to villages and the like as well as a generic one applied to all human settlements (villages, towns, forts . . . etc.). For village planning according to *śilpa* and cognate literature see *Mānasāra* (chapter 9), *Īśānaśiva* (Kriyā. 25.7 sq.), *Arthaśāstra* (II.1) and Dutt 1925, Kane vol. III, pp. 140 sq., P.K. Acharya, "Villages and Towns in Ancient India" (*B.C. Law Volume*, II, 1946, pp. 275 sq.).
2. The presentation of distance measurement units would have been better placed together with the general system of measurements in chapter 5. *Gavyūta* is called *goruta* in *Arthaśāstra* (II.20.25).
3. Cf. *Īśānaśiva* (Kriyā. 25. 7b-8):

   चतुरश्राष्टपण्डा भूः काकणी तच्चतुर्गुणः ।
   माषो वेदगुणं तस्माद् भवेद् वर्तनकाह्वयम् ॥
   तत्पञ्चगुणितावाटी कुडुवं तच्चतुर्गुणम् ।

   Vāṭikā (or *vāṭī*) corresponds to Tam. *velī* in Anbil copperplates (cf. T.A. Gopinatha Rao, "Anbil plates of Sundara Chola", *Epigraphica Indica*, vol. 15 pp. 44 sq.); that *velī* gets several submultiples (see K.A. Nilakantha Sastri, *The Coḷas*, 2nd edn., 1955 pp. 621 and 624); amongst them the *mā* (= 1/20) and the *kāṇi* (= 1/80) can correspond to the *māṣa* and *kākaṇī* mentioned in *Mayamata*. All these area measurements are calculated from the 'rope' (*rajjus*) which makes eight poles (*daṇḍa*, see 5.9).

ग्रामे विंशतिभागे कुटुम्बभूमिस्तदेकभागेन ॥ ५ ॥
[10]दण्डैः पञ्चशतैर्यद्धीनं ग्रामस्य मानमिदम् ।
तस्मात् पञ्चशतद्धर्या[11] यावद् विंशत्सहस्रदण्डान्तम् ॥ ६ ॥
प्रोक्तं चत्वारिंशद्भेदं ग्रामस्य मानमिदम् ।
द्विसहस्रदण्डमानं[12] सार्धसहस्रं सहस्रदण्डं च ॥ ७ ॥
नवशतमथ सप्तशतं पञ्चशतं त्रिशतमिति च विस्तारम् ।
नगरस्य [13]सहस्रादिद्विसहस्रान्तं च दण्डमानं स्यात् ॥ ८ ॥
नगरस्याष्टसहस्रैर्दण्डैः पर्यन्तमानमिदम् ।
[14]द्विद्विसहस्रक्षयतो द्विसहस्रान्तं चतुर्विधं मानम् ॥ ९ ॥
[15]ग्रामः खेटः खर्वटमथ दुर्गं नगरमिति च पञ्चविधम् ।
दण्डैस्तेषां मानं वक्ष्येऽहं त्रित्रिभेदभिन्नानाम्[16] ॥ १० ॥
चतुरधिकषष्टिदण्डो ग्रामः स्याद्धीनहीनमिति कथितः[17] ।
ग्रामस्य मध्यमस्य द्विगुणं त्रिगुणं तथोत्तमं प्रोक्तम् ॥ ११ ॥
षट्पञ्चाशद्द्विशतं हीनं खेटं सविंशति त्रिशतम् ।
मध्यममुत्तममेवं सचतुरशीति त्रिशतदण्डम् ॥ १२ ॥
अष्टौ चत्वारिंशच्चतुःशतं द्वादशं[18] च पञ्चशतम् ।
षट्सप्ततिपञ्चशतं[19] हीनं मध्योत्तमं च खर्वटकम् ॥ १३ ॥

10. F : omits 6a
11. C : पञ्चशताद्यं
12. A : द्विसहस्रदण्डमानादि; C : द्विसहस्रदण्डमादिः
13. C : सहस्रादिर् for सहस्रादि
14. C, F : द्विद्विसहस्रक्षयके
15. F : ग्रामखेटखर्वटमथ
16. C : त्रित्रिभागभिन्नानाम्
17. C : ग्रामं स्याद्धीनहीनमिति कथितम्
18. C : द्वादश
19. A, C, F : पञ्चदशं

village.[4] These are area measurements; herewith the dimensions of (villages) given in poles.

Dimensions of villages and other settlements

4b-5 The largest size for a village is one hundred thousand poles; starting with twenty thousand poles and, with regular increments (of twenty thousand), five dimensions suitable for a village are obtained.[5] The plot intended for a family occupies one-twentieth of the village (?).[6]

6-7a The smallest size for a village is five hundred poles; by starting with this figure and proceeding to twenty thousand poles by successive increments of five hundred poles, forty dimensions suitable for villages are obtained.

7b-8a The width (of village) is two thousand poles, one thousand five hundred, one thousand, nine hundred, seven hundred, five hundred or three hundred poles.

8b-9a The dimensions of a town (*nagara*), given in poles, are from one thousand to two thousand. The largest size for a town is eight thousand poles; (starting with this figure) and reducing it successively by two thousand, four sizes for a town are obtained.

10 Village, *kheṭa*, *kharvaṭa*, fort and town:[7] these are the five (settlements) for which I am going to give the dimensions in poles with three variations for each.

11-13 The smallest village is said to be sixty-four poles (wide), the medium village is twice that width and the large one triple. A small *kheṭa* is two hundred and sixty-six poles, a medium one three hundred and twenty and a large one three hundred and eighty-four. The respective dimensions of small, medium and large *kharvaṭa* are four hundred and

4. *Kuṭumbāvani* should designate here an area of agricultural land (and not "a residential block general inhabited by kinsmen" as suggested by Dutt, *op. cit.* p. 203). Anbil copperplates mention the gift of ten *vāṭikā* of land as an *ekabhoga-brahmadeya* (K.A. Nilakantha Sastri, *op. cit.* p. 577: for *ekabhoga* see below v. 31).
5. The dimensions given here are most probably those of the territory controlled by the settlement and not of the settlement itself (see 10.4 where the size of the biggest of the capitals is given as 16000 poles).
6. We don't undertstand the relation of that sentence to the context.
7. *Kheṭa, kharvaṭa, durga* and *nagara* will be described in the next chapter.

[20]चत्वारिंशत्षट्शतमधमं दुर्गं चतुःसप्तशतदण्डम् ।
मध्यममुत्तमदुर्गं सप्तशतं षष्टिरष्टौ हि ॥ १४ ॥
द्वात्रिंशदष्टशतकं नगरं षण्णवत्यष्टशतदण्डम् ।
षष्टिर्नवशतमधमं मध्यममुत्कृष्टमिति यथासंख्यम् ॥ १५ ॥
षोडशदण्डविवृद्ध्या प्रत्येकं नवविधं भवति ।
द्विगुणं त्रिपादमर्धं पादं तेषां मुखायतं विपुलात्[21] ॥ १६ ॥
व्यासषडष्टांशैकं[22] चतुरश्रं वा यथेष्टं स्यात् ।
तस्मिन् विपुलायामे दण्डैरोजैः प्रमाणमात्तव्यम् ॥ १७ ॥
शेषं वाटधरार्थं[23] ग्रामादिषु सर्ववस्तुषु च ।

[आयादि]

आयादिसम्पदर्थं वृद्धिं हानिं च यष्टिभिः कुर्यात् ॥ १८ ॥
आयव्ययर्क्षयोन्यायुभिरथ[24] तिथिभिश्च वारैश्च ।
[25]यजमानवस्तुनामजन्मर्क्षेणाविरोधिकं यत्तु ॥ १९ ॥
तन्मानेन समेतं गृह्णीयात् सर्वसम्पत्तयै[26] ।
व्यासायामसमूहे वसुनिधिगुणिते दिनेशधर्महृते[27] ॥ २० ॥
आयव्ययमवशिष्टं[28] रामघ्नेऽष्टापहृच्छेषम् ।
ध्वजधूमसिंहश्वावृषखरगजकाकाश्च योनिगणाः ॥ २१ ॥
अष्टौ योनय उदिता ध्वजहरिवृषहस्तिनः शुभदाः[29] ।
पुनरपि वसुभिर्गुणिते त्रिनवाहृत्या[30] फलं वयः[31] शिष्टम् ॥ २२ ॥

20. F : Verses 14-15 are replaced by a prose/ paraphrase.
21. C : विपुलयात्
22. C : अष्टांशकश instead of अष्टांशैकं
23. A : वाटधरार्धं; A (var), C : वाटधरास्थं
24. B (var) : आयुन्यंशैः
25. C : यजमानस्तुजन्मर्क्षेणाचराधिकं यत्तु ।
26. A (var), F : वस्तुसम्पत्त्यै
27. C : दिनेशधर्येते
28. C : आयव्ययावशिष्टो
29. F : ध्वजहरिवृषणहस्तसुभदा
30. A, F : त्रिनवहान्या; C : त्रिनवन्यूने
31. B (var) : तु यत् for वयः

forty-eight, five hundred and twelve and five hundred and seventy-six poles.

14-15 A small fort is six hundred and forty poles (wide), a medium one, seven hundred and four and a large one, seven hundred and sixty-eight. Small, medium and large towns are respectively, eight hundred and thirty-two, eight hundred and ninety-six and nine hundred and sixty poles wide.

16-17a If sixteen pole increments are used, there are nine more possibilities for each.[8] The length[9] is double the width or three quarters, one half or a quarter (greater) or may be a sixth or eighth (more); otherwise the plan may be square if so desired.

17b-18a The basic dimensions (of the settlement) will be taken from that width and length making an odd number of poles; the remainder will belong to the area which is not built up;[10] this is the procedure for all sites such as villages etc. . . .

The āyādi system[11]

18b-20a (The dimensions given) in poles have to be increased or reduced so as to agree with the *āyādi* series. In order that a perfect result may be achieved (a site) must be selected whose dimensions are not in opposition to the 'gains', 'losses', 'asterisms', 'matrices', 'ages', 'solar days' and 'lunar days' nor to the asterisms of the founder nor to his name nor to that of the place itself.

20b-22a The sum of the length and the width having been multiplied by eight and by nine and the (product obtained) divided by twelve and ten, the remainders are the 'gain' on the one hand and the 'loss' on the other. (The sum of the length and the width) having been multiplied by three

8. This is an alternative to the sixty-four pole increment used up to now.
9. *Mukhāyata*: 'main dimension', see chapter 23 note 4.
10. Cf. *Īśānaśiva* (Kriyā. 25.28b-29a):
एतेषां विपुलायामावायुगमैरेव दण्डकैः ।
विधातव्यावतः शेषं वाटीसञ्चारभूमिका ॥
There seems to be an opposition between the developed land (*avaṭa*) where are the houses and the undeveloped land (*vāṭadhara, vāṭīsañcāra, bhūmikā*) which is for agriculture, roads and the like.
11. See below 26.206 sq., 33.58 sq., 36.294-298 and Dagens 1984 pp. 18-19.

[32]नक्षत्रं परिणाहे त्रिशद्व्याप्ते तिथिर्यमीशहते ।
वारं सूर्यमुखं स्याद् बुद्धैवं सर्ववस्तु करणीयम् ॥ २३ ॥
[33]आयाधिकमथ सुखदं[34] व्ययमधिकं सर्वनाशं स्यात् ।
विपरीते तु विपत्त्यै तस्मात् सम्यक् परीक्ष्य कर्तव्यम् ॥ २४ ॥

[विप्रसंख्या]

द्वादशसहस्रविप्रैर्यन्निष्ठित[35]मुत्तमोत्तमं ग्रामम् ।
[36]दशसाहस्रैर्मध्यममधमं स्यादष्टसाहस्रैः ॥ २५ ॥
सप्तसहस्रैर्विप्रैर्मध्यमोत्तममित्यभीष्टं स्यात् ।
षट्साहस्रैर्मध्यममधमं तु पञ्चसाहस्रैः ॥ २६ ॥
[37]अधमोत्तमं तु चातुःसाहस्रैस्तु त्रिसाहस्रैः ।
अधमसमं द्विसहस्रैरधमाधममेव निर्दिष्टम् ॥ २७ ॥
साहस्रैर्द्विजसङ्घैर्नीचोत्तममाहुराचार्याः ।
सप्तशतैरधममध्यममिह पञ्चशतैस्तु नीचाल्पम् ॥ २८ ॥
साष्टशतं तु द्विगुणं त्रिगुणं वेदाधिकं तथाशीतिः ।
[38]अष्टाष्टकपञ्चाशद् द्वात्रिंशच्च त्रिरष्टौ हि ॥ २९ ॥
[39]द्वादशषोडशविप्रैर्दशभेदं क्षुद्रकं ग्रामम् ।
अन्यदशक्तानां चेद् दानं दशभूसुरान्तमेकादि ॥ ३० ॥

32. B (var) : नक्षत्रं परिनहे त्रिशत्यप्ते तिथिस्तिथिहते स्यात्
33. F : omits 24 and 25.
34. A (var) : शुभदं
35. A (var), C : अधिष्ठितं for यन्निष्ठितं
36. F : Verses 256-30 are replaced by a prose/paraphrase.
37. C : अधमोत्तमं चतुःसहस्रैस्त्रिसहस्रैरधममध्यमम् ।
38. B (var) : अष्टाधिकपञ्चाशद्
39. C : षोडशभिर्द्वादशभिर्विप्रैर्दशभेदं क्षुद्रकग्रामम् ।

and (the product) divided by eight, (the remainder) corresponds to one of the eight matrices which are: 'flag', 'cloud', 'lion', 'dog', 'bull', 'donkey', 'elephant', and 'crow'; amongst these 'flag', 'lion', 'bull' and 'elephant' are auspicious.

22b-23 Next, (the sum of the length and the width) having been multiplied by eight and (the product) divided by twenty-seven, the quotient (*phala*) is the 'age' (*vayas*) and the remainder (corresponds) to the asterism; if (the same) product is divided by thirty, (the remainder corresponds to) the solar days, the first of which is Sunday. The entire construction must be made in this knowledge.

24 It is auspicious that the 'gain' be superior (to the 'loss') and totally inauspicious should the 'loss' be superior (to the 'gain'). As the transgression of these rules leads to failure, nothing should be undertaken prior to deep study (of the subject).

Number of Brahmins

25-28 The largest village of the highest category is that where there are twelve thousand brahmins, the medium village where they are ten thousand, and the small where they are eight thousand. It is prescribed that seven thousand brahmins be installed in a large village of the intermediate category, six thousand in a medium one and five thousand in a small one. Four thousand are prescribed for the largest village in the inferior category, three thousand for the medium and two thousand for the small; the experts ordain that there be a thousand brahmins in the largest village of the last category, seven hundred in the intermediate one and five hundred in a small one.

29-30 There are ten varieties of small villages which house respectively: one hundred and eight, two hundred and sixteen, three hundred and twenty-four,[12] eighty-four, sixty-four, fifty, thirty-two, twenty-four, twelve and sixteen brahmins. When there is no alternative the gift (of land) is to be given to brahmins in the number of one to ten.

12. Literally: "one hundred and eight brahmins, double or triple".

एककुटुम्बिससमेतं कुटिकं स्यादेकभोगमिति[40] कथितम् ।
तस्य सुखालयमिष्टं[41] शेषाणां दण्डकादीनि ॥ ३१ ॥
[42]युग्मायुग्मविभागैर्द्विविधं स्यात् सर्ववस्तुविन्यासम् ।
युग्मे सूत्रपथं[43] स्यादसमे पदमध्यमे च वीथी[44] स्यात् ॥ ३२ ॥
अन्योन्यसङ्करश्चेदशुभं स्यात् सर्वजन्तूनाम् ।

[ग्रामनामानि]

दण्डकमपरं[45] स्वस्तिकमित ऊर्ध्वं प्रस्तरं चैव ॥ ३३ ॥
पश्चात् प्रकीर्णकं[46] स्यान्नन्द्यावर्तं परागमथ पद्मम् ।
स्याच्छ्रीप्रतिष्ठितेनैवाष्टविधं ग्राममुद्दिष्टम् ॥ ३४ ॥

[वीथिविधानम्]

सर्वेषां ग्रामाणां मङ्गलवीथ्यावृता[47] बहिस्त्वबहिः ।
[48]ब्रह्मस्थानं ह्युदितं तस्मिन् देवालयं तु वा पीठम् ॥ ३५ ॥

40. A et C : स्यात्तदेकमोगमिति
41. F : मुखालयं दिष्टं
42. A (var), C : युग्मायुग्मे विन्यासे द्विविधं
43. F : सूत्रं प्रदं
44. C : विद्धिः for वीथी
45. C : दण्डकं परं
46. C : सङ्कीर्णकं
47. C : आप्रता for आवृता
48. C : ब्रह्मस्थानाभ्युदितं

31 A village in which there is only one family is a *kuṭika*, also called *ekabhoga*.[13] A *sukhālaya* house should be constructed here and *daṇḍaka* houses elsewhere.[14]

32-33a There are two sorts of diagrams pertaining to the setting up of all constructions: those consisting of an even number of squares and those where the number is odd. If the number is even, the streets should be drawn along the lines (of the diagram) and, if odd, they should go through the middle of (rows of) squares; any confusion brings misfortune to the inhabitants.

Names of villages

33b-34 It is said that there are eight types of villages: *daṇḍaka*, *svastika*, *prastara*, *prakīrṇaka*, *nandyāvarta*, *paraga*, *padma* and *śrīpratiṣṭhita*.[15].

Streets

35 The street on the internal or external periphery of all villages is called *maṅgalavīthi*;[16] a temple or an altar is installed at the centre which is called the place of Brahmā.[17]

13. Cf. *Kāmika* I.20.4:

एको ग्रामणिको यत्र सभृत्यपरिचारकः ।
कुटिकं तद् विजानीयादेकभोगः स एव तु ॥

and *Īśānaśiva* (Kriyā.25.46):

एकद्विजाद्याद्वादशान्तास्त्वेकभोगादिका दश ।

14. *Sukhālaya*: see 27.40-41; *daṇḍaka*: see 26.22 sq.
15. Same list in *Īśānaśiva* Kriyā. 25.48-49; the following one is given in *Mānasāra* (9.2-6): *daṇḍaka*, *sarvatobhadra*, *nandyāvarta*, *padmaka*, *svastika*, *kārmuka*, *caturmukha*. See Dutt 1925 p. 205.
16. The *maṅgalavīthi* is also called 'street for the (temple) chariot' (*rathamārga*, v. 38a) for it is followed by processions during temple festivals. It surrounds the village inside or outside its limits (*bahis tv abahiḥ*): see below v. 43 where the surrounding street of the *svastika* village runs outside the limits of the diagram used for the laying-out of the village.
17. This prescription is not clear. The proper centre seems to be occupied by a place (see 10.72) around which may be located several buildings (*ibid.* and 9.73 sq.).

एकद्वित्रिचतुर्भिः पञ्चभिरपि कार्मुकैश्च मार्गततिः ।
प्राक्प्रत्यग्गतमार्गा [49]ऋतुदण्डमहापथाख्यास्ते ॥ ३६ ॥
[50]मध्यमयुक्ता वीथी ब्रह्माख्या सैव नाभिः स्यात् ।
द्वारसमेता वीथी राजाख्या च द्विपार्श्वतः क्षुद्रा ॥ ३७ ॥
सर्वाः कुट्टिमकाख्या मङ्गलवीथी तथैव रथमार्गम्[51] ।
तिर्यग्द्वारसमेता नाराचपथा इति ख्याता ॥ ३८ ॥
उत्तरदिङ्मुखमार्गाः क्षुद्रार्गलवामनाख्यपथाः[52] ।
ग्रामावृता मङ्गलवीथिकाख्या पुरावृता या जनवीथिका स्यात् ।
तयोस्तु रथ्याभिहिताभिधा स्यात्[53] पुरातनैरन्यतमेष्वथैवम् ॥ ३९½ ॥

[ग्रामभेदाः]

द्विजकुलपरिपूर्णं वस्तु यन्मङ्गलाख्यं
नृपवणिगभियुक्तं वस्तु यत्तत् पुरं स्यात् ।
तदितरजनवासं ग्राममित्युच्यतेऽस्मिन्
मठमिति पठितं यत् तापसानां निवासम् ॥ ४०½ ॥

49. A, B, C, F : ऋजुदण्ड-; A (var) : ऋजुभाण्ड-
50. F : omits verses 37-38a.
51. A (var), C : सदेव रथमार्गा
52. A (var) : क्षुद्राख्या वामनार्गलपथाः
53. A (var) : -आभिधाना instead of -आभिधा स्यात्

36-39a The width of a street is one, two, three, four or five poles[18] but those which traverse (the village) from east to west are six poles[19] (wide) and are called 'main streets'. The street (which encircles) the middle of the village is called *brahmavīthi* and is the 'navel' (of the village).[20] The roads leading to the gates are called *rājavīthi* and those which flank them are the alleys.[21] It is said that all these streets are called 'paved (streets)'[22] but the *maṅgalavīthi* is said to be the 'street for the (temple) chariot'. The streets leading to the secondary gates are called *nārāca*; those going towards the north are called *kṣudra*, *argala* and *vāmana*.[23]

39b The street which encircles a village is called *maṅgalavīthi* and that which encircles a town, *janavīthi*; both are designated as 'chariot streets' (*rathya*) but, according to the ancients, this expression applies to all the other streets too.[24]

Types of settlement

40 A place where there are only brahmins is called *maṅgala*;[25] that inhabited by princes and merchants is a *pura*,[26] the place inhabited by other people in this world is called *grāma*; a place where ascetics dwell is called *maṭha*.[27]

18. *Kārmuka* ('bow') is used here in place of *daṇḍa*.
19. *Ṛtudaṇḍa* 'six poles': however if we follow the text given in Trivandrum edition (*ṛjudaṇḍa*) the meaning would be 'straight as a pole'.
20. It must surround the central place of the village; in a town it is bordered by shops (10.80).
21. See 10.72; according to *Kāmika* (I.21.2) *rājavīthi* is a synonym for *maṅgalavīthi*.
22. *Kuṭṭima*: the same term is used to designate the base of a building (14.40).
23. *Nārāca* ('arrow'): those streets may be those which connect the secondary gates (*upadvāra, tiryagdvāra*) and the streets leading to the main gates: their oblique direction, similar to that the feather of an arrow, would explain their name. *Argala* designates probably a dead-end street; *kṣudra* and *vāmana* are naturally some kind of small alleys.
24. Cf. *Īśānaśiva* (Kriyā. 25.50):
ग्रामपर्यन्तवीथिस्तु ख्याता मङ्गल्वीथिका।
नगरे जनवीथी स्याद् रथ्याख्या खेटकादिषु॥
25. Cf. *Mānasāra* 9.122-23, 213-14. *Maṅgala* is a synonym for *agrahāra* (see e.g. *Kāmika* I.20.3; K.A. Nilakantha Sastri, *op. cit.*, p. 492).
26. *Pura* is applied to a big capital (e.g. 10.4-5) as well as to a small settlement (cf. 10.10 and all the names of villages ending in *-puram* . . .).
27. *Maṭha*: see K.A. Nilakantha Sastri, op. cit., pp. 629, 636 . . . .

प्रागुदगग्रं मार्गं ककनीकृतदण्डवत्तु[54]तन्मध्ये ॥ ४१ ॥
द्वारचतुष्टययुक्तं दण्डकमिति भण्यते मुनिभिः[55] ।
दण्डवदेका वीथी साप्येवं दण्डकं प्रोक्तम्[56] ॥ ४२ ॥
नवपदयुक्ते ग्रामे परितो मार्गं पदस्य तस्य बहिः ।
तस्मात् प्रागुदगग्रात् प्राग्वीथी दक्षिणाग्रा सा ॥ ४३ ॥
तस्मात् प्राग्दक्षिणतो दक्षिणवीथी प्रतीचिमुखा[56bis] ।
तस्मादवागपरतः पश्चिमवीथ्यग्रमुत्तरतः[57] ॥ ४४ ॥
[58]अपरोत्तरतस्तस्मादुत्तरवीथ्यां मुखं प्राच्याम् ।
एतत् स्वस्तिकमुदितं स्वस्त्याकृत्या चतुर्मार्गम् ॥ ४५ ॥
प्राक्प्रत्यग्गतमार्गैस्त्रिभिरुदगग्रैस्त्रिभिश्चतुर्भिरथो ।
पञ्चभिरपि षट्सप्तभिरपि युक्तं[59] प्रस्तरं पञ्च ॥ ४६ ॥
प्रागग्रैस्तु चतुर्भिर्द्वादशशिवपङ्क्ति[60] नन्दवसुमार्गैः ।
उदगग्रैरभियुक्तं ह्येतत् प्रोक्तं प्रकीर्णकं पञ्च ॥ ४७ ॥
प्राक्प्रत्यग्गतमार्गैः पञ्चभिरुदगग्रै[61]स्त्रयोदशभिः ।
त्रिःसप्तभिरथ तिथिभिः षोडशभिः सप्तदशभिरपि मार्गैः ॥ ४८ ॥
युक्तं[62] नन्द्यावर्तं दिक्षु चतुर्द्वारसंयुक्तम् ।
नन्द्यावर्ताकृत्या [63]बाह्ये द्वारैरबाह्यतो मार्गैः ॥ ४९ ॥
[64]युक्तानेकैर्युक्तं नन्द्यावर्ताभमिदमुदितम् ।
[65]आद्यैरष्टादशभिर्द्वाविंशत्यङ्ककै[66]रुदग्वक्त्रैः ॥ ५० ॥

54. C : कङ्करीकृतदण्डवस्तु
55. C : पण्डितैः ख्यातम्; F : भक्ष्यते मुनिभिः
56. F : दण्डकः प्रोक्तः
56bis. F : मुखम्
57. C : बीथ्याग्रमुत्तरतः
58. F : अपरो तस्मादुत्तरतो मुखं प्राच्याम्
59. A (var) : अभियुक्तं for अपि युक्तं
60. F : द्वादशपङ्क्ति- for द्वादशशिवपङ्क्ति- -
61. C : अग्रैस् for de उदग्रैस्
62. A (var), C : उक्तं for युक्तं
63. C : बाह्य-
64. C : युक्त्यानेकैर्
65. F : omits 50b-51a.
66. C : द्वाविंशत्यन्तकैर्; A (var) : द्वाविंशत्यंशकैर्

41-42 The sages give the name *daṇḍaka* to a village comprising a road going north and another east; both are rectilinear and cross at right angles to the centre.[28] This village has four gates. *Daṇḍaka* is also the name for a village with one single road, straight as a pole.

43-45 A *svastika* village is one whose diagram consists of nine squares; all around is a street drawn outside these (nine) squares.[29] One street starts in the north-east, goes towards the west and ends in the south; one goes from south-east to the north and ends in the west; another goes from the the north-east to the south and ends in the east. This village follows a *svastika* figure and comprises four (main) streets.[30]

46 There are five types of *prastara* village; they comprise three streets going from east to west and three, four, five, six or seven starting from north.[31]

47 There are five types of *prakīrṇaka* village; they comprise four streets going from east (to west) and twelve, eleven, ten, nine or eight starting from north.[32]

48-50a The *nandyāvarta* village comprises five streets going east-west and thirteen, fourteen, fifteen, sixteen or seventeen coming from the north; it has gates at the four cardinal points. Its plan resembles a *nandyāvarta* figure, the gates being external to the figure, the streets inside it, and there being numerous crossroads; it is said to be in the form of *nandyāvarta*.

50b-51a A village with from eighteen to twenty-two streets from the north and six from the east is called *paraga*.

28. *Kakanikṛtadaṇḍavat*: for the meaning of that expression see Dutt 1925 p. 206.
29. The diagram is of *pīṭha* type (see 7.24 and below v. 55); the surrounding street is the *maṅgalavīthi* (see above note 16). See fig. 7 p. LI.
30. The *svastika* figure is drawn by the four streets described above; the *Mānasāra* (9.326) gives a totally different description.
31. See Dutt 1925, p. 234.
32. *Ibid.*, p. 242.

षड्भिः प्राङ्मुखमार्गैर्युक्तं ह्येतत् परागमिति कथितम् ।
प्राक्प्रत्यग्गतमार्गैः सप्तभिरुदगग्रैस्त्रिवेदशरैः ॥ ५१ ॥
षट्सप्तभिरपि युक्तै[67]र्विंशतिभिः पञ्चधा पद्मम्[68] ।
[69]अष्टभिरथ पूर्वाग्रैरुदगग्रैः साष्टविंशतिभिः ॥ ५२ ॥
आद्यैर्द्विः षोडशभिमार्गैरन्त्यैर्युतं[70] यत्तु ।
तच्छ्रीप्रतिष्ठितं स्यादष्टविधं ग्राममुद्दिष्टम्[71] ॥ ५३ ॥
अथवा श्रीवत्सादिकमुपनेतव्यं[72] तु विन्यासम् ।
सर्वेषां ग्रामाणां नाभिं न प्रोतयेन्मतिमान् ॥ ५४ ॥
ग्रामे वाऽथ गृहे वा दण्डच्छेदोऽपि नैव[73] कर्तव्यः ।
सकलाद्यासनकान्तं विन्यासार्थं पदं बुधैर्ग्राह्यम् ॥ ५५ ॥
क्षुद्रग्रामे मार्गाश्चत्वारश्चाष्ट मध्यमे ग्रामे ।
द्वादश षोडश मार्गा ग्रामेषूत्कृष्टकेषु मताः ॥ ५६ ॥

[द्वाराणि]

भल्लाटे च महेन्द्रे राक्षसपादे तु[74] पुष्पदन्तपदे ।
द्वारायतनस्थानं जलमार्गाश्चापि चत्वारः ॥ ५७ ॥
[75]वितथपदेऽथ जयन्ते सुग्रीवांशे च मुख्यदेवपदे ।
भृशपूषभृङ्गराजा[76] दौवारिकशोष[77] नागदितिजलदाः ॥ ५८ ॥
स्थानमुपद्वाराणामष्टौ देवा इमे कथिताः ।
त्रिकरं पञ्चकरं तत् सप्तकरं द्वारविस्तरम् ॥ ५९ ॥

67. A (var): अभियुक्तैर् for अपि युक्तैर्
68. F: पदयम्
69. F: omits Verses 52b to 66.
70. C: अन्तैर्युतं
71. A (var): भेदमिति कथितम्
72. C: उपनीतव्यं
73. C: न for नैवं
74. A (var): -भागेषु for -पादे तु
75. A (var): पितथे पदे जयन्ते
76. A (var), C: भृङ्गराज-
77. C: रोग for नाग

51b-52 There are five kinds of *padma* village; they comprise seven streets going east-west, three, four, five, six or seven streets starting from the north and twenty crossroads.

53 The *śrīpratiṣṭhita* village comprises eight streets starting in the east and from twenty-eight to thirty-two starting in the north.[33]

54a Eight types of villages have been described but a *śrīvatsa* or other type of village may also be established.

54b-55 In every village the sage begins by laying out the navel. Whether for village or house, only (dimensions in) whole numbers of poles must be used.[34] To draw the plan the sages may use any diagram, from the *sakala* (with one square) to the *āsana* (with one hundred).[35]

56 There are four streets in the small village, eight in the medium one and twelve (or) sixteen in the large.[36]

Gates

57-61a The gateways are established on the squares of Bhallāṭa, Mahendra, Rākṣasa and Puṣpadanta; the four sewage outlets are on the squares of Vitatha, Jayanta, Sugrīva and Mukhya; the eight secondary gates are on the squares of Bhṛśa, Pūṣan, Bhṛṅgarāja, Dauvārika, Śoṣa, Nāga, Diti and Jalada.[37] The breadth of the door is three, five or seven cubits and their height double, one and a half or one and three quarters of that.[38] Every

33. *Ibid.*, p. 243.
34. See vv. 92-93.
35. See 7.8 sq.
36. This must concern only the main streets.
37. See Fig 8 (p. LII). This makes a total of twelve gates (four main ones and eight secondary gates) which number is prescribed for the layout of the capital city in *Arthaśāstra* (II.4.2: *sa dvādaśadvārayuktodakabhramacchannapathaḥ*). The same disposition is prescribed for house (27.44 sq.) and palaces (29.73 sq.). According to the chapter dealing with doors it seems that it is not necessary to establish all the twelve gates and the corresponding sewage outlets; however when there is only one main gate its position rules that of the corresponding secondary entrances and sewage outlet (see 30.44 and 50). A description of fortified gateways is given in chapter 10 (vv. 40-42).
38. For proportions of doors see 30.2 sq.

तारद्विगुणोत्सेधं चाध्यर्धं[78] वाङ्घ्रिहीनं तत् ।
सर्वेषां ग्रामाणां परितः परिखा बहिश्च वप्राश्च ॥ ६० ॥
ग्रामादयोऽपि नद्या दक्षिणतीरे तदन्वितायामाः ।
[79]नवनववसुवसुभागे मध्ये ब्राह्मं ततः परं दैवम् ॥ ६१ ॥
मानुषमथ पैशाचं क्रमशः सङ्कल्प्य युक्त्या तु[80] ।
दैविकमानुषभागे विप्राणां स्याद् गृहश्रेणी ॥ ६२ ॥
कर्मोपजीविनां स्यात् पैशाचे तत्र वा द्विजावासम् ।
तस्मिन् सुरगणभवनं क्रमशः प्रागादिषु स्थाप्यम् ॥ ६३ ॥

[प्रासादस्थानम्]

एतस्याभ्यन्तरे विप्रदेवतास्थापनं भवेत् ।
शिवहर्म्यं च ग्रामाणां समं बाह्येऽथवा भवेत्[81] ॥ ६४ ॥
भृङ्गराजांशके वाऽपि पावके तु विनायकम् ।
ऐशांशे शिवहर्म्यं स्यात् सौम्ये वानान्तरेषु[82] वा ॥ ६५ ॥
बाह्येऽस्य तु गृहश्रेणी मानेन विधिना कुरु ।
शैवानां परिवाराणां प्रोक्तं स्थानमिहोच्यते[83] ॥ ६६ ॥
[84]सूर्यपदे सौरं स्यादग्निपदे कालिकावेश्म ।
भृशभागे विष्णुगृहं[85] याम्यायां षण्मुखस्थानम् ॥ ६७ ॥
भृशभागे मृगांशे तु नैरृत्यां केशवालयम् ।
सुग्रीवांशे गणाध्यक्षः पुष्पदन्तपदेऽपि वा ॥ ६८ ॥

78. A (var) : चार्धं for चाध्यर्धं
79. A : नवनवमुनिवसुभागे; B : नववसुमुनिवसुभागे; C : नवनवमुनिमुनिभागे,
80. A (var) : संलक्ष्य युक्त्या तु; C : सङ्कल्प्य चोक्तं तु
81. A : शिवहमत्यञ्च ग्रामाणां संवाह्य तु वा भवेत् ।
82. C : स्थानान्तरेषु
83. A : प्रोच्यमासमुच्यते; C : प्रोच्वमासनमुच्यते
84. F : सूर्यपते
85. A (var), C : विष्णुपदं

village must be surrounded by a moat and ramparts but the best villages are those located on a river and extending along its south bank.[39]

61b-63 In the diagram comprising eighty-one squares and in that with sixty-four,[40] the *brāhma* zone in the centre and the *daiva, mānuṣa* and *paiśāca* zones must be determined, one after the other. The dwellings of brahmins should be in the *daiva* and *mānuṣa* zones and those of the craftsmen[41] in the *paiśāca* zone, or the dwellings of brahmins are there and the temples of the hosts of gods should be placed there too, starting in the east.

Temple locations

64-66a Inside that zone are installed brahmins and gods. Thus is the case for the Śiva temple which may be outside the village as well. The temple of Vināyaka should be on the square of Bhṛṅgarāja or that of Pāvaka; the Śiva temple is on the squares of Īśa, Soma or of any other deity and living quarters with the prescribed dimensions are to be constructed around it.[42]

66b-73a The positions are now given for the attendant deities of Śiva;[43] the temple of Sura is on the square of Sūrya, that of Kālikā on the square of Agni, the Viṣṇu temple is on the square of Bhṛśa and the Ṣaṇmukha one on the square of Yama. The temple of (Viṣṇu)-Keśava is on the square of Bhṛśa, Mṛga or Nirṛti; the Gaṇādhyakṣa temple is on the square of Sugrīva or of Puṣpadanta; the Āryaka[44] temple is on the square of Nirṛti. The shrine of Viṣṇu is on the square of Varuṇa; Viṣṇu, in this shrine, may

39. The river may replace the moat; for its position see 3.1.
40. *Nava-nava-vasu-vasubhāga*: one may understand that those numbers refer to the division of the diagram into four concentric zones as indicated afterward (see Fig. 9, p. LVII). In that case it is necessary to make a slight emendation and to read *nava-muni-vasa-vasubhāge*, for *brāhma* zone makes up nine squares (*nava*), *daiva* sixteen (that is to say nine plus seven [*muni*]), *mānuṣa* twenty-four (sixteen plus eight) and *paiśāca* thirty-two (twenty-four plus eight).
41. *Karmopajīvin*: 'who lives on one's work'.
42. See 10.77 sq.
43. The shrines of attendant deities (*parivāra*) are dealt with in chapter 23 (vv. 35 sq.); here they are distributed inside the settlement whose enclosure is considered as identical to that of the Śiva temple.
44. Āryaka is Śāstṛ (cf. chapter 12 note 35).

आर्यकभवनं निर्ऋते वरुणे[86] विष्णोर्विमानं स्यात् ।
स्थानकमासनशयनं धाम्न्येतस्मिन्[87] क्रमेण चोर्ध्वतलात्[88] ॥ ६९ ॥
अथवा मूलतलं [89]घनमुपरितले स्थानकं प्रोक्तम्[90] ।
[91]सुगतालयमथ सुगले भृङ्गनृपे चैव जिनधाम[92] ॥ ७० ॥
मदिरालयमथ[93] वायौ मुख्ये कात्यायनीवासः[94] ।
[95]सोमे धनदगृहं वा मातॄणामालयं तत्र ॥ ७१ ॥
ईशे शङ्करभवनं पर्जन्यांशे जयन्ते वा ।
[96]सोमे धनदगृहं वा शोषपदे वा विधातव्यम् ॥ ७२ ॥
तत्र गजाननभवनं ह्यदितौ वा मातृकोष्ठं स्यात् ।
मध्ये विष्णोर्धिष्ण्यं तत्र सभामण्डपं प्रोक्तम्[97] ॥ ७३ ॥
ब्रह्मस्थानैशाने वाग्नेय्यां वा सभास्थानम् ।
तदुदक्पश्चिमभागे हरिसदनं[98] दक्षिणे परतः ॥ ७४ ॥
क्रूरसमेतं कर्म प्रत्ययमथ पञ्च मध्ये तु ।
युग्मायुग्मपदे च ब्रह्मस्थानेऽष्टनवभागे ॥ ७५ ॥
व्यपनीयाजं भागं प्रागादिषु दिक्षु च क्रमशः ।
[99]नलिनकभवनं स्वस्तिकनन्द्यावर्तौ प्रलीनकं चैव[100] ॥ ७६ ॥
यच्छ्रीप्रतिष्ठिताख्यं[101] चतुर्मुखहर्म्यं[102] तु पद्मसमम् ।
विष्णुच्छन्दविमानं त्रितलादिद्वादशतलान्तम् ॥ ७७ ॥

86. C : निर्ऋतिवरुणौ
87. F : एकस्मिन् for एतस्मिन्
88. A (var) : चाक्ततलात्
89. F : खनम् for घनम्
90. A (var) : वोक्तम्; F ; नोक्तम्
91. F : सुगतालयमथ सुगलेन्द्रं नगं नृपे चैव जिनायम्
92. A, C : नृपधाम (cf. 12.59-63).
93. A (var) : अग्ने for अथ
94. A (var), C : वासम्
95. F : omits 71b-96b.
96. A (var) : सोमे सोमगृहं वा
97. C : वोक्तम्
98. A (var) : हरिसभां for हरिसदनं
99. C : नलिनकभवनस्वस्तिकनन्द्यावर्तप्रलीनकश्चैव ॥
100. A (var) : नलीनकं चैव
101. A (var) : प्रतिष्ठताख्यं
102. C : चतुर्मुखाख्यं

be shown successively standing, seated and reclining, starting from the top floor. Or else, the ground floor is massive and Viṣṇu is shown standing on the top floor.[45] The temple of Sugata is on the Sugala square and that of Jina on the Bhṛṅgarāja square.[46] The shrine of Madirā[47] is on the Vāyu square and that of Kātyāyanī on the square of Mukhya. The shrine of Dhanada and that of the Mothers are on the square of Soma and the Śaṅkara temple on the square of Īśa, Parjanya or Jayanta. Dhanada may be on the square of Soma or on that of Śoṣa where may also be found the Gajānana shrine.[48] By the same token, the shrine of the Mothers may be installed on the Aditi square.

73b-75a The Viṣṇu temple is at the centre where should be, as well, the pavilion for the assembly, placed on the north-eastern or south-eastern squares of the place of Brahmā, the Hari temple being in its north-western or south-(western) parts. The consequences of constructing upon the five (remaining squares?) will without doubt be disastrous.[49]

75b-78 According to whether the diagram is even or odd the place of Brahmā is to be divided into eight or nine squares. Buildings of the *nalinaka*, *svastika*, *nandyāvarta*, *pralīnaka*, *śrīpratiṣṭhita*, *caturmukha* and *padmāsana* types[50] should be built in each direction, starting from the east and avoiding the Aja square. There should also be a temple of the

45. Three or four-storeyed Viṣṇu temples containing standing, seating and reclining Viṣṇu images located each in a separate storey are found in Tamil Nadu (e.g. Vaikuṇṭhaperumā temple in Kāñcīpuram, Sundaravadaraperumā temple in Uttaramerūr, etc.); cf. G. Colas, *Le Temple Selon Marīci* (Pondichéry 1986), pp. 57 sq.
46. The Buddha and the Jina are placed amongst Śiva's attendant deities (12.59-63, 36.281-288); they do not appear in the lists given in chapter 23, but the foundation deposit of their shrines is described in chapter 12 (vv. 59-62).
47. Madirā, a violent form of Devī, is amongst the divinities honoured in the fort (see 10.50 and note *ad loc.*)
48. Other positions have been given before for the temple of Gaṇeśa (v. 65: Vināyaka; v. 68: Gaṇādhyakṣa).
49. The disposition described here is not clear and we do not know exactly which parts of the centre are left without buildings.
50. Buildings corresponding to that list (with the exception of *nandyāvarta*) are described in *Īśānaśiva* (vol. III, pp. 269-74) but we do not know their purpose.

बहिरप्येवं सौधं[103] ग्रामादिषु तत्र विज्ञेयम् ।
स्थितमासीनं शयनं यत्र यदिष्टं तु तत्र[104] तत् स्थाप्यम् ॥ ७८ ॥
उत्कृष्टमध्यमाधमनीचादिकं क्रमेणैवम् ।
[105]भवनं ग्रामेषूदितमिति नीचं चोत्तमे न स्यात् ॥ ७९ ॥
क्षुद्रे क्षुद्रविमानं[106] यद्यत्रैवोचितं विधातव्यम् ।
त्रिचतुष्पञ्चतलं तद्धीने हीने[107] च सामान्यम् ॥ ८० ॥
ग्रामे वा नगरे वोत्कृष्टे देवालयं तु नीचं चेत् ।
नीचा भवन्ति पुरुषाः स्त्रियोऽपि दुःशीलतां यान्ति ॥ ८१ ॥
तस्मात् सममधिकं वा तत्संख्येव[108] प्रयोक्तव्या ।
हरिहरसदनं वास्तुकमन्यत् सर्वं यथेष्टं स्यात् ॥ ८२ ॥

[दौवारिकाः]

चण्डेश्वरः कुमारो धनदः काली च पूतना[109] चैव ।
कालीसुतश्च खड्गी चैते दौवारिकाः प्रोक्ताः ॥ ८३ ॥
प्राक्प्रत्यङ्मुखमैशं ग्रामादिषु तत्पराङ्मुखं शुभदम् ।
[110]विष्णुगृहं सर्वमुखं ग्रामस्यान्तर्मुखं शुभदम् ॥ ८४ ॥
[111]शेषं पूर्वाभिमुखं मातृणामुत्तराभिमुखम् ।
प्रत्यग्द्वारं सौरं गेहारम्भात् पुरामरावासम् ॥ ८५ ॥

103. A (var), C : सर्व- for सौधं
104. A (var) : तत्
105. C : भवनं ग्रामेषूदितमितनीचं चोत्तमे तस्मात् ।
106. A (var), C : क्षुद्रे क्षुद्रे विमानं
107. B : हीनं
108. A (var) : तत्संख्येया
109. C : पूतनां
110. C : विष्णुमुखं ग्रामं स्यात्तन्मुखं शुभदम् ।
111. C : शेषाणां मातृमुखं

viṣṇucchanda type; it should have from three to twelve storeys. It should be known that the (Viṣṇu) temple may be outside the village and that the (god) should be installed here in standing, seated and reclining positions.[51]

79-82 It is laid down that, in the villages, there may be superior, medium, inferior or lowly buildings but that a lowly (building) should not be installed in a superior (village); if prescribed a small shrine may be built in a small village. A temple with three, four or five storeys is to be built in a small (village) and, as well, in a small village there should be a shrine of the same (class). If an inferior temple is built in a village or town of superior class the men there will become inferior and their women will incline towards undesirable conduct; according to this rule a temple should either be equal or superior to (the village).[52] The temple of Harihara and any other building may be as desired (?).

Divinities of the gates

83 Caṇḍeśvara, Kumāra, Dhanada, Kālī, Pūtanā, Kālīsuta and Khadgin are the divinities of the gates.[53]

Orientation of shrines

84-85 In settlements such as villages the temple of Īśa is orientated towards either the east or the west; it is beneficial if turned towards the exterior of the (settlement). The dwelling of Viṣṇu may be orientated in any direction but is beneficial if turned towards the centre of the village. Other (shrines) are orientated towards the east but that of the Mothers is turned towards the north and the entrance of that of Sūrya is in the west. The dwellings of the gods of a city should be built prior to the houses.

51. Viṣṇu is not specifically named here, however mention of standing, seating and reclining images does not leave any doubt on the matter (see above note 45). For *saudha*= 'temple' see 19.10.
52. For the upper, medium and lower categories of building see 11.12-13.
53. Those *dauvārika* are different from *dvārapāla* who would have been in even number; their temples are probably near the gates.

[वर्ज्यस्थानानि]

हृदये वंशस्थाने शूले सूत्रे च सन्धौ च ।
कर्णसिरायां षट्के नोक्तान्यमरालयादीनि ॥ ८६ ॥

[श्रेणिस्थानम्]

गोशाला दक्षिणतश्चोत्तरदेशे तु पुष्पवाटी स्यात् ।
[112]पूर्वद्वारोपान्ते पश्चिमतस्तापसावासम् ॥ ८७ ॥
सर्वत्रैव जलाशयमिष्टं वापी च कूपं च ।
[113]वैश्यानां दक्षिणतः परितः सदनं तु[114] शूद्राणाम् ॥ ८८ ॥
प्राच्यां वाऽप्युत्तरतो गेहं कुर्यात् कुलालानाम् ।
तत्रैव नापितानामन्यत्कर्मोपयुक्तानाम् ॥ ८९ ॥
मत्स्योपजीविनां स्याद् वासं[115] वायव्यदेशे तु ।
पश्चिमदेशे मांसैरुपवृत्तीनां निवासः स्यात् ॥ ९० ॥
[116]तैलोपजीविनां चैवोत्तरदेशे गृहश्रेणिः ।

[गृहलक्षणम्]

धनुभिस्त्रिपञ्चसप्तभिरथ [117]नवभिर्गृहावधिः प्रोक्तः ॥ ९१ ॥
दण्डाभ्यामथ तस्मादायामं वर्धयेत् क्रमशः ।
व्यासद्विगुणावधिकं यावद् दैर्घ्यं ग्रहीतव्यम् ॥ ९२ ॥
तत्रैव हस्तमानैर्गेहं कुर्याद् यथाविधिना ।
[118]रुचकः स्वस्तिकमथवा नन्द्यावर्तं[119] च सर्वतोभद्रम् ॥ ९३ ॥
स्याद् वर्धमानमेषामाकृत्या तच्चतुर्गृहं प्रोक्तम् ।
दण्डकशालालाङ्गलमथवा शूर्पं यथेष्टं स्यात् ॥ ९४ ॥

112. A (var): पूर्वद्वारे वापि
113. A (var): वैश्यादीनां
114. A (var): च
115. C: वासं स्याद् for स्याद् वासं
116. C: तैलोपजीविनां स्याद् वासं वायव्यदेशे तु।
117. C: असिमन्नेवं for अथ नवभिर्
118. A (var): रुचकं
119. A (var): नन्द्यावर्त्तश्

Locations to be avoided

86 These are the six places where there should be no temples or buildings of that kind: the heart (of the Spirit of the site) and its bones, the stakes, the lines (of the diagram), their intersections and the diagonals (and) parallels.[54]

Planning

87-91a The cowshed should be to the south, the flower garden to the north and the dwelling of ascetics either near the eastern gate or to the west. A tank or reservoir should be placed everywhere where water is required. The quarter for vaiśya is to the south and that for śūdra on the periphery. The potters' houses are either to the east or to the north, where are found too those of barbers and other artisans; the fishermen's quarter is to the north-west and that of the butchers to the west and, lastly, the oil makers' quarter is to the north.

Houses[55]

91b-94 The width of houses should be three, five, seven or, at most, nine poles and the corresponding lengths are obtained by adding successively two poles to the width but should be such as not to exceed twice those widths. The house should then be built with the aid of dimensions calculated in cubits according to the rule. It may be a four main building house called *rucaka*, *svastika*, *nandyāvarta*, *sarvatobhadra* or *vardhamāna* according to its appearance; or else it may be a *daṇḍaka* house (with one main building) or a *lāṅgala* one (with two) or a *śūrpa* one (with three).[56]

54. See 7.55; the stakes (*śūla*) must be the *khātaśaṅkhu* used in the laying-out operations (6.16 sq.); see chapter 27 note 14.
55. See chapter 26.
56. *Rucaka* . . .: see 26.64-187; *daṇḍaka*, *lāṅgala*, *śūrpa*: see 26.11 sq.

ग्रामात् किञ्चिद्दूरे पावकदेशेऽथवा वायौ ।
वासः स्यात् स्थपतीनां शेषाणां तत्र कर्तव्यम् ॥ ९५ ॥
तस्मात् किञ्चिद्दूरे रजकादीनां निवासः स्यात् ।
चण्डालकुटीराणि पूर्वायां क्रोशमात्रे तु ॥ ९६ ॥
चण्डालयोषितस्तास्ताम्रायःसीसभूषणाः सर्वाः ।
[120]पूर्वाह्णे मलमोक्षक्रियोचिता ग्राममावेश्य ॥ ९७ ॥
प्रागुत्तरदिशि दण्डैः पञ्चशतैः स्याच्छवावासम्[121] ।
शेषाणामपि तत्तद्दूरे देशे श्मशानं यात् ॥ ९८ ॥

[विन्यासदोषाः]

चण्डालचर्मकार[122]श्मशानतोयाशयापयानं च ।
देवगृहविश्वकोष्ठग्रामावृतदेशमार्गपरिवृत्तिः ॥ ९९ ॥
व्यसनं ग्रामविनाशो नृपभङ्गो भवति मरणं च ।
देवालयान्तरापणशून्यत्वं शोध्यसञ्चयं चापि ॥ १०० ॥
मार्गेऽशुद्धक्षेपणमीदृग् ग्रामस्य शून्यतादायि ॥ १०० $\frac{१}{२}$ ॥

[गर्भविन्यासः]

ग्रामादीनां च सर्वेषां गर्भविन्यासमुच्यते ॥ १०१ ॥
सगर्भं सर्वसम्पत्त्यै विगर्भं सर्वनाशनम् ।
तस्मात् सर्वप्रयत्नेन गर्भं सम्यग् विनिक्षिपेत् ॥ १०२ ॥
मृत्कन्दधान्यसल्लोह[123]धातुरत्नेन्द्रनीलाद्यैः[124] ।
पणेन गर्भद्रव्याणि निर्दोषाण्येव सङ्गृहेत्[125] ॥ १०३ ॥

120. C : पूर्वाह्णे मलमोक्षक्रियौचिता ग्राममावेश्याः ।
F : पूर्वाह्णे मलमोक्षक्रियोचितका ग्राममावह्ये ।
121. A (var) : स्याच्छिवावासम्
122. A (var), C : कर्मकार- for चर्मकार
123. C : लोहानि for सल्लोह
124. A, B, C, F : रत्नेन्द्रनीलकैः
125. A (var), F : गृह्यताम्

95-98 The dwellings of other *sthapati*[57] are to be erected at a distance from the village, to the south-east or to the north-west and a little farther away still are the quarters of the dyers and people of that ilk. Caṇḍāla huts are a *krośa* to the east; the wives of the caṇḍāla wear jewellery in copper, iron and lead;[58] upon entering the village in the morning, caṇḍāla must cleanse it of dirt. Five hundred poles to the north-east is the cremation ground and a little farther on is the cemetery for inferior classes.[59]

Errors in planning

99-100 If the house of caṇḍāla or curriers or the cemetery or well are badly placed or if there is any departure from the rule as regards temples, village (itself), *viśvakoṣṭha*,[60] surrounding territory or streets, then misfortune will result: destruction of the village, loss of the prince and death. Equally, if the temples and bazaars[61] are empty and if heaps of dirt and filth are thrown into the streets[62] the result will be the annihilation of the village.

Placing the foundation deposit[63]

101-103 Now is elucidated the placing of the foundation deposit in villages and in other settlements. If there is a foundation deposit then success is ensured but, if not, failure is inevitable; the greatest care must therefore be taken in the laying of a comprehensive deposit including earths, roots, grains, (grains represented in) metals,[64] colouring substances[65]

57. *Sthapati*: we do not know why the architects' houses are mentioned here, unless those houses are to be built before the foundation of the village and outside its site.
58. See Kane vol. II, p. 81.
59. Literally 'a cemetery for the others'. According to *Arthaśāstra* (II.4.12), the cemetery contains two parts: one (which may correspond to the *śavavāsa* mentioned in *Mayamata*) is for upper class and the other for lower ones.
60. *Viśvakoṣṭha* (see also 18.210): "place for oblations" (?) (= *havyakoṣṭha*) or = *annālaya* (see 27.36, 46-47, ...).
61. *Antarāpaṇa*: 'bazaar', see 10.80 sq.
62. Cf. *Arthaśāstra* II.36-26.
63. For a more detailed account see chapter 12.
64. See below v. 118 and 12.23-25.
65. See 12.25-27.

सलिलापूरिते श्वभ्रे मृदादीनि न्यसेद् बुधः ।
धान्योपरि निधातव्यं ताम्रभाजनमभ्रमम् ॥ १०४ ॥
ताम्रभाजनविस्तारं पञ्चधा परिकीर्तितम् ।
रत्निद्वादशपङ्क्त्यष्टचतुरङ्गुलमानतः[126] ॥ १०५ ॥
उन्नतं तावदेवं स्याद् [127]वृत्तं स्याच्चतुरश्रकम् ।
[128]सपञ्चपञ्चकोष्ठं वा नवकोष्ठकमेव वा ॥ १०६ ॥
उपपीठपदे देवास्तस्मिन् पात्रे तु सम्मताः[129] ।
रजतेन वृषः[130] सूर्ये[131] वज्री[132] हाटकनिर्मितः ॥ १०७ ॥
यमे तु [133]यमराजश्च शुल्बेनायसवारणः[134] ।
[135]हैमः सिंहस्तु रूप्येण वरुणे[136] सजलाधिपः[137] ॥ १०८ ॥
वाजी श्वेतमयः सोमे राजतो द्विजराजकः ।
ईशे वैकृन्तमनले त्रपु सीसं तु नैर्ऋते ॥ १०९ ॥
[138]स्वर्णं समीरणे जातिहिङ्गुल्यं तु जयन्तके ।
[139]हरितालं भृशे भागे वितथे[140] तु मनःशिला[141] ॥ ११० ॥
[142]माक्षिकं भृङ्गराजे स्याद् राजावर्तं सुकन्धरे ।
गैरिकं शोषभागे तु [143]गणमुख्येऽञ्जनं भवेत् ॥ १११ ॥
अदितौ दरदं विद्यादेवमेव न्यसेत् क्रमात्[144] ।
चतुष्पदे च लोकेशाः स्थाप्याश्चाभ्यन्तराननाः ॥ ११२ ॥

126. A (var), C : मानतम्
127. A (var), F : वृत्तं वा चतुरश्रकम्
128. F : पञ्चपञ्चककोष्ठं
129. F : विन्यसेत् for सम्मताः
130. C : वृषं
131. A (var) : सूर्यो
132. C : वज्र-
133. A (var) : यमराजस्य
134. C : गुल्फेनायसवारणः ;
F : शुल्पेनाशवारणः
135. A (var) et C : हेमसिंहं तु
136. C : वरुणेन
137. A (var) : सजलाधिपम्
138. A (var) : फणं
139. F : अरितालं मृशे
140. F : विषमे
141. C : मनःशिलम्
142. F : माक्षिकं भृङ्गराजे तु राजावत्तु सुगन्धरे
143. F : गुण- for गण-
144. F : एवमेकं क्रमान्न्यसेत्

and precious stones such as *indranīla* sapphire. The elements chosen for a deposit should be flawless and are to have been purchased.

104-106 Having filled the (foundation) pit with water,[66] the sage puts the elements in place beginning with the earths; above the grains a flawless copper casket must be put, for which there are five (possible) widths which are: fourteen,[67] twelve, ten, eight or four digits, the height being equal to the width. The casket may be either square or circular and it has twenty-five or nine compartments.

107-112a If the container is in accordance with the *upapīṭha* diagram (and thus has twenty-five compartments) then the gods will be placed there as follows: Vajrin in gold and a silver bull in (the compartment corresponding to) Sūrya, Yamarāja in copper and a gold elephant in the compartment of Yama, Jalādhipa in silver and a gold lion in that of Varuṇa, Dvijarāja in silver and a silver horse in that of Soma.[68] In the compartment of Īśa there should be mercury, in that of Anala tin, in that of Nirṛti lead and in that of Samīraṇa gold. In the compartment of Jayanta there is cinnabar, in that of Bhṛśa orpiment, in that of Vitatha red arsenic, in that of Bhṛṅgarāja pyrites, in that of Sukhandara lapis, in that of Śoṣa red chalk, in that of Gaṇamukhya[69] antimony and in that of Aditi red copper. This is to be properly understood and the elements arranged in order.

112b- The lords of the cardinal points are installed facing the centre (of the

66. See 12.4 and note *ad loc.*
67. *Ratni*= 'fourteen': see *Saṃketa Kośa* p. 210.
68. Those gods are the *dikpāla* (see v. 112b) however the mounts prescribed for Indra and Yama are not regular.
69. Gaṇamukhya: elsewhere Mukhya.

षड्भिः पञ्चचतुस्त्रिद्विमात्रे बिम्बोदयं भवेत् ।
तदर्धं वाहनोत्सेधं स्थानकासनमेव वा ॥ ११३ ॥
[145]मुक्तापवत्से मरिचौ विद्रुमं सवितर्यथ ।
पुष्परागं च वैडूर्यं विवस्वति विनिक्षिपेत् ॥ ११४ ॥
वज्रमिन्द्रजये विद्यादिन्द्रनीलं तु मित्रके[146] ।
रुद्रराजे महानीलं मरकतं तु महीधरे ॥ ११५ ॥
मध्यमे पद्मरागं तु विन्यसेद् गर्भभाजने ।
रत्नानि धातवश्चैव स्वस्वविस्तारभाजने[147] ॥ ११६ ॥
[148]तद्देवस्थानभावज्ञैरानीतानि निधापयेत् ।
[149]हेमायस्ताम्ररूप्यैश्च स्वस्तिकानि चतुर्दिशि ॥ ११७ ॥
ब्रह्मस्थानाद् बहिष्ठानि पूर्वादौ स्थापयेत् क्रमात् ।
[150]स्वर्णेन शालिं[151] रूप्येण[152] व्रीहिं चायसकोद्रवम् ॥ ११८ ॥
[153]त्रपुकङ्कु सीसमाषं तिलं[154] वैकृन्तकल्पितम् ।
मुद्गं चायोमयं ताम्रं [155]कुलत्थमिति लोहजान् ॥ ११९ ॥
भाजनाय बलिं दत्त्वा पश्चात् सर्वं निधापयेत् ।
अङ्गुलाधिकविस्तीर्णमायामं द्वादशाङ्गुलम् ॥ १२० ॥
पञ्चाङ्गुलेन वृद्धिः स्यादाद्वात्रिंशत्प्रमाणतः[156] ।
खादिरं चेन्द्रकीलं[157] स्यात् तस्याग्रं चित्रवृत्तकम्[158] ॥ १२१ ॥
भाजनोपरि तत् स्थाप्यं गर्भन्यासविचक्षणैः ।
स्थानीये द्रोणमुखे खार्वटे[159] प्रतिनागरे ॥ १२२ ॥

145. F : मुक्ताभवत्से मरुचौ
146. F : त्विन्द्रके for तु मित्रके
147. F : स्वाल्पविस्तारभाजने
148. A (var), F : तद्देवस्थानभावज्ञैस्तानि तानि विधात्यताम् ।
149. F: हेमायस्ताम्रनिर्घैश्च
150. F : सौवर्णे
151. C : शालि
152. F : रूपेण
153. A (var) : त्रपुसङ्कु ; F : मृपुकङ्कु
154. F : तलं pour तिलं
155. C : कुलित्थम्
156. F : स्यादाद्वात्रिंशादङ्गुलं तथा ।
157. F : चेन्दुनीलं
158. A (var) : चक्रवृत्तकम् ; F : त्रिवृत्तकम्
159. A (var) : खवटि

113 casket) and in four compartments; their images are six, five, four, three or two digits high[70] and their mounts half that height; they are either standing or seated.

114-117a There is a pearl in the compartment of Āpavatsa, coral in that of Marīci, a topaz in that of Savitṛ, a tiger's eye gem in that of Vivasvant, a diamond in that of Indrarāja, an *indranīla* sapphire in that of Mitraka, a *mahānīla* sapphire in that of Rudrarāja and an emerald in that of Mahīdhara; a ruby is placed in the centre of the casket. The responsibility for the arranging of precious stones and colouring substances each at its proper place in the casket should devolve upon those well acquainted with their nature and with the placing of gods.

117b-119 *Svastika* in gold, iron, copper and silver should be set at the four cardinal points. Around the compartment of Brahmā and exterior to it, the following grains should be placed, starting from the east and in the given order: *śāli* in gold, *vrīhi* in silver, *kodrava* in iron, *kaṅku* in tin, *māṣa* in lead, *tila* in mercury, *mudga* in iron and *kulattha* in copper.[71]

120-122a When an offering has been made to the casket everything should be arranged (in it). The length (of the board which is to cover the casket)[72] is greater by one digit than its width and may be twelve digits to thirty-two by successive increments of five. Above is a perfectly circular stake in *khadira* wood which should be laid in place on top of the casket by those who know the rules relating to foundation deposits.[73]

122b- In *sthānīya*, *droṇamukha*, *kharvaṭa*, in towns of all types, in villages

70. According to the size of the casket (vv. 105-06).
71. See 12.23-25 where the disposition is slightly different.
72. Cf. 12.44.
73. About this stake (here called *indrakīla*) see 12.45 (*stambha*!).

ग्रामे च निगमे खेटे पत्तने कोत्मकोलके ।
ब्रह्मण्यार्यार्किभागेऽपि[160] विवस्वति यमे तथा ॥ १२३ ॥
मित्रे च वरुणे चैव सोमे च पृथिवीधरे ।
[161]द्वारदक्षिणदेशे वा ह्येतेषां गर्भ इष्यते ॥ १२४ ॥
[162]पुष्पदन्ते च भल्लाटे महेन्द्रे च गृहक्षते ।
विष्णुस्थाने श्रियः स्थाने स्कन्दस्थानेऽथवा पुनः ॥ १२५ ॥
स्थापयेद् ग्रामरक्षार्थं[163] सर्वकामाभिवृद्धये[164] ।
गर्भमादौ विनिक्षिप्य बिम्बं तदुपरि न्यसेत् ॥ १२६ ॥
[165]शिलेष्टकचिते खाते पुरुषाञ्जलिमात्रके ।
अनुक्तानां च सर्वेषामजभागादिषु न्यसेत् ॥ १२७ ॥
[166]सुरक्षं तु यथागर्भं स्थपतिः स्थापयेत् स्थिरम्[167] ।
अत्रानुक्तं तु तत् सर्वं द्रष्टव्यं गर्भलक्षणे ॥ १२८ ॥
एव प्रोक्ता भूमितिर्देवतानां[168]
वर्णानां चाप्यत्र जात्यन्तराणाम् ।
ग्रामादीनां मानविन्यासमार्गं
सालङ्कारं चारु संक्षिप्य तन्त्रात्[169] ॥ १२९ ॥
[170]दद्यान्नृपः स्थपतिकादिचतुष्टयेभ्यो
[171]मानादिकर्मनिपुणेभ्य इडां च गां च[172] ।
नित्यं यथा जगति वित्तमनेकवस्तू-
न्याचन्द्रतारमधिवासभुवं मुदा सः॥ १३० ॥

इति मयमते वस्तुशास्त्रे ग्रामविन्यासो[173] नाम
नवमोऽध्यायः

161. C : द्वारदक्षिणे देशे बाह्ये तेषां गर्भ इष्यते ।
162. Manuscript E resumes here.
163. F : सर्वरक्षार्थं for ग्रामरक्षार्थं
164. C : सर्वकामाय विन्यसेत्
165. 127a and 127b are inverted in F.
166. A (var) : सुरक्ष्यं
167. A (var), E, F : क्रमात् for स्थिरम्
168. E : एवं प्रोक्तं भूमिदेवादिकानाम्
169. E : तत्रात्
170. A, E, F : सक्तान्नृपः
171. C : गामानकर्म-
172. C : गाश्च
173. E : ग्रामगर्भवन्यासो

and in *nigama*, *kheṭa*, *pattana* and *kotmakolaka*[74] the foundation deposit may be at the place of Brahmā, that of Ārya, that of Arka or those of Vivasvant, Yama, Mitra, Varuṇa, Soma or Pṛthivīdhara or, again it may be to the right of the gates situated at the places of Puṣpadanta, Bhallāṭa, Mahendra or Gṛhakṣata[75] or it may be placed beneath the temples of Viṣṇu, Śrī or Skanda in order that the protection of the village may be guaranteed and all wishes accomplished.

126b-127 Once the foundation deposit is in place an image is set up above it, in a pit lined with stones and bricks and the size of two cupped hands. (Images) (?) of all the gods not mentioned should be placed in the squares (of the diagram) starting with Aja.

128 The architect must install a solid (construction) well protected by the corresponding foundation deposit (?): he may look in the chapter dealing with foundation deposits for what is not given here.

129 Thus have been expounded the dimensions of sites suitable for gods and superior and inferior castes as well as the dimensions, street layouts and embellishments to settlements such as villages; this has been taken from the Tantra.[76]

130 The prince is obliged to offer land and cows to the tetrad who are led by the architect and who are skilful in measuring. He who does this without reservation will gain riches in abundance and his kingdom will extend to the moon and stars as long as the world shall endure.

Thus ends, in the *Mayamata*, treatise on dwelling,
the ninth chapter: VILLAGES PLANNING.

74. For those kinds of settlement see next chapter.

75. Gṛhakṣata: elsewhere Rākṣasa.

76. This verse (*triṣṭubh śālinī*) and the next one (*vasantatilakā*) are found with slight variations at the end of the next chapter.

अथ दशमोऽध्यायः[1]

[नगरविधानम्]

नगरादीनां मानं विन्यासं च क्रमादहं वक्ष्ये ।

[नगरमानम्]

आद्यं धनुषां त्रिशतं तस्माच्छतदण्डवर्धनादुपरि ॥ १ ॥
[2]साष्टकसप्ततिभेदाश्चाष्टसहस्रान्तकं यावत् ।
नगराणां विपुलं हि प्रोक्तं पूर्वोक्तमानेन ॥ २ ॥
[3]शतदण्डादिदशर्द्ध्या त्रिःसप्तत्रिशतदण्डान्तम् ।
क्षुद्राणामिदमुदितं नगराणामेव सर्वेषाम् ॥ ३ ॥
[4]उत्कृष्टपुरपरिधिर्नृपतेर्यष्टिद्विरष्टसाहस्रैः ।
चातुःसहस्रकान्तं पञ्चशतोनाद्धि[5] पञ्चपञ्चधा मानम् ॥ ४ ॥
त्रिशतादिचतुःशतकं यावद् वृद्ध्या तु विंशतिभिः ।
षड्विधमुक्तं खेटं श्रेष्ठे मध्ये परे विपुलम् ॥ ५ ॥
तस्मात् त्रिरष्टवृद्ध्या द्रोणमुखे[6] पञ्चधा मानम् ।
[7]षण्णवतिचतुःशतकं यावत् तावत्तु विस्तारम् ॥ ६ ॥
द्विशतादि चतुःशतकं यावत् पञ्चाशदभिवृद्ध्या[8] ।
[9]पञ्चप्रमाणमेवं खर्वटविस्तार उद्दिष्टः ॥ ७ ॥
[10]द्विशतादिपङ्क्तिवृद्ध्या चत्वारिंशत्त्रिशतदण्डं स्यात् ।
[11]यावन्निगमे विपुलाः प्रोक्तास्त्रिःपञ्चभेदाश्च ॥ ८ ॥

1. Chapter missing in D and F.
2. E : साष्ट च for साष्टक-
3. E : शतदण्डाद् दशवृद्ध्या त्रिसप्ततित्रिशतकान्तं स्यात्
4. C : उत्कृष्टपुरं परितो
5. C : पञ्चशतोनं; E : पञ्चशतेनार्थं for पञ्चशतोनाद्धि
6. E : द्रोणमुखैः
7. A, C : सषण्णवति
8. E : पञ्चदशभिर्वृध्यात्
9. A (var), C : पञ्चप्रमाणमुदितं
10. E : द्विशतादिपञ्चवृद्ध्या चत्वारिंशं त्रैशतदण्डम्
11. E : यावद्विपुले निगमं प्रोक्तं प्रोक्तास्त्रिपञ्चभेदाश्च

CHAPTER 10

TOWNS[1]

1a Now I give the dimensions of towns followed by their plans.

Dimensions of towns

1b-3 Going from three hundred poles up to eight thousand by successive increments of one hundred poles, seventy-eight widths are obtained for towns.[2] Going from a hundred poles up to three hundred by successive increments of ten poles, twenty-one (widths) for very small towns are obtained.

4 The surrounding wall of the largest capital city[3] measures sixteen thousand poles; diminishing to four thousand poles by successive reductions of five hundred poles gives twenty-five (possible perimeters for capitals).

5-11a Going from three hundred poles to four hundred by successive increments of twenty poles, gives the widths of the six types of *kheṭa*: two superior, two medium and two inferior. From (four hundred poles) to four hundred and ninety-six there are six (possible) widths for *dronamukha*. From two hundred poles to four hundred by successive increments of fifty poles there are five possible widths for *kharvaṭa*. From two hundred poles to three hundred and forty by successive increments of ten poles gives fifteen possible widths for *nigama*. From one hundred to five hundred poles by successive increments of one hundred poles gives five (possible) widths for *kotmakolaka* and,

1. See *Mānasāra* (chapter 10), *Īśānaśiva* (Kriyā. chapter 25), *Arthaśāstra* (II.1-4). One may note that amongst 'towns' (*nagara*) there is a special type named *nagara* (vv. 19-20).
2. *Nagara*: The dimensions given here are totally different from those given in chapter 9 (vv. 8-9).
3. *Pura*: see below v. 10 and chapter 9 note 26.

शतदण्डे शतवृद्ध्या पञ्चशतं यावदुद्दिष्टम्।
स्यात् कोत्मकोलकानां विपुलं पञ्चैव भेदेन ॥ ९ ॥
तावन्मानं प्रोक्तं पुरविपुले सूरिभिः प्राज्ञैः ।
यावत् पञ्चशतान्तं त्रिशतादारभ्य[12] सप्तधा[13] मानम् ॥ १० ॥
पञ्चाशद्धनुवृद्ध्या विपुलं कथितं विडम्बस्य ।
[14]प्रागुपदिष्टं मानं ह्येतन्मानं तु वैतेषाम्[15] ॥ ११ ॥
द्विगुणं त्रिपादमर्धं पादं तेषां मुखायतं विपुलात् ।
विपुले तु षडष्टांशे भागेनैकेन वायतं पुरतः[16] ॥ १२ ॥

[वप्रविधानम्]

चतुरश्रमायताश्रं वृत्तं वृत्तायतं च पुनः ।
स्याद् गोलवृत्तमेवं[17] वप्राकारास्तु[18] पञ्चैव[19] ॥ १३ ॥
पङ्क्त्यष्टसप्तपञ्चक[20] चतुरंशैस्तत् कृते[21] विपुले ।
मुनिरसशरयुगशिखिभि[22]र्भागैर्वप्रावधिः प्रोक्तः ॥ १४ ॥
[23]द्वित्रिचतुर्हस्तं स्याद् विपुलं सालस्य तुङ्गं तु ।
[24]सप्तदशैकादशभिर्हस्तैरग्रं त्र्यंशोनम्[25] ॥ १५ ॥
परितः परिखा बाह्येऽबाह्ये देवालयादीनि ।

[वर्ज्यस्थानानि]

पेचकभागाद्यासनभागान्तं[26] चण्डितं प्रोक्तम् ॥ १६ ॥

12. A (var), C : द्विशतं प्रारभ्य
13. C : पञ्चधा
14. E : प्रागुणोपरिष्टं
15. C : वैकेषाम्
16. A (var) and E add : ज्येष्ठे ज्येष्ठायतकं मध्ये मध्यं नीचम् ।
17. A, C, E : एषां for एवं
18. A (var), C : वप्राः कथितास्तु
19. E : पञ्चधा
20. C : पञ्च for पञ्चक
21. A (var), C : कृतं
22. E : वसुभिर् for शिखिभिर्
23. E : द्वित्रिचतुर्भिर्हस्तं विपुलं सालस्य तुङ्गं तु
24. A (var), E : सप्तनवैका-
25. E : त्रियंशोन
26. A (var) : -सनकान्तं

according to the sages, these widths apply to the *pura* as well. The width of *viḍamba* goes from two hundred to five hundred poles giving seven possible widths with a difference of fifty poles between each.

11b-12 The dimensions having been indicated, here are the proportions:[4] the length is double the width or one and a quarter times it, otherwise the length exceeds the width by a sixth or an eighth.

The surrounding wall

13-14 Square, rectangular, round, elliptical or perfectly circular, such are the five layouts for the walls.[5] Their lengths may be seven-tenths, six-eighths, five-sevenths, four-fifths or three-fourths of the perimeter (of the town?).[6]

15-16a The thickness of the (bottom of the) wall is two, three or four cubits; its height is seven, ten or eleven cubits: its thickness at the top is two-thirds what it is at the bottom. There is a moat all around the exterior and inside are the temples . . . etc.

4. *Mānam . . . mānam*: '(measured) dimension . . . (relative) dimension'.
5. See vv. 42b-43.
6. This is not very clear; it seems to imply that the dimensions given before are those of the town itself together with its immediate surroundings.

सूत्रादीन्यथ विषमस्थानानि च[27] वर्जयेन्मतिमान् ।

[मार्गाः]

प्रागुदगग्रं मार्गं[28] तत्र यथेष्टं न्यसेद् विधिना ॥ १७ ॥
दण्डादिसप्तदण्डं यावद्[29] दण्डार्धवृद्ध्या तु ।
मार्गविशालाश्चैते त्रयोदशभेदाः समुद्दिष्टाः ॥ १८ ॥

[राजधानी]

राष्ट्रस्य मध्यभागे सज्जनबहुले[30] नदीसमीपे च ।
नगरं केवलमथवा राजगृहोपेतराजधानी वा ॥ १९ ॥
दिक्षु चतुर्द्वारयुतं गोपुरयुक्तं तु सालाढ्यम् ।
क्रयविक्रयकैर्युक्तं सर्वजनावाससङ्कीर्णम् ॥ २० ॥
सर्वसुरालयसहितं नगरमिदं केवलं प्रोक्तम्[31] ।
[32]प्रत्यगुदग्दिशि गहना परितः साला बहिः सपांसुचया ॥ २१ ॥
परितः परिखा बाह्ये शिबिरयुतानेकमुखरक्षा ।
पूर्वायां दक्षिणतश्चाभिमुखा राजबलयुक्ता ॥ २२ ॥
उन्नतगोपुरयुक्ता नानाविधमालिकोपेता ।
सर्वसुरालयसहिता नानागणिकान्विता बहूद्याना ॥ २३ ॥
हस्त्यश्वरथपदातिबहुमुख्या[33] सर्वजनयुक्ता[34] ।
[35]द्वारोपद्वारयुताभ्यन्तरतोऽनेकजनवासा ॥ २४ ॥
[36]या नृपवेश्मसमेता[37] सा कथिता राजधानीति[38] ।
काननवनदेशे वा सर्वजनावाससङ्कीर्णम् ॥ २५ ॥

27. A (var) suppress च
28. E : प्रागुदगग्रमार्गं
29. C (var) : सप्तदण्डान्तं यावत्
30. E : विपुले for बहुले
31. C : नगरं केवलमिति प्रोक्तम्
32. A (var), C : प्रत्युदग्दिशि गहनयुता परितः साला बहिस्तु पांसुयुता ।
33. C : पदातिभी रक्षायुक्ता
34. C : समाजसंयुक्ता; E : सर्वजनसहिता
35. A (var) : द्वारोपद्वाराभ्यन्तरतोऽनेकजनलासा; E : द्वारोपद्वारवृता ह्यन्तरतोऽनैकैवजलवासा ।
36. E : यन्नृपवेश्मसमिता प्राकारान्तःपुरोऽधिका कथिता ।
37. A (var) : नृपवेश्यसमेता
38. A (var) : राजधानिका कथिता

Places to be avoided

16b-17a Diagrams such as *pecaka* (with four squares) or *āsana* (with a hundred squares) or those between them should be used; the sage must avoid (building) on their lines and on other forbidden places.[7]

Streets

17b-18 A street should be planned there, or wherever desired, but starting at the north (or at the) east and according to the rules.[8] From one pole to seven by successive increments of half a pole, there are thirteen (possible) breadths for the streets.[9]

The royal capital

19 A heavily populated town situated in the middle of the kingdom and beside a river is an 'ordinary' (*kevala*) town though if there is a royal palace there it is a 'royal capital'.

20-21a A town is called 'ordinary' when it has four entrances at cardinal points, gateways[10] and ramparts, when it contains shops as well as dwellings for all classes of people[11] and temples for all the gods.

21b-25a A town called 'royal capital' is impregnable at the north and at the east; it is encircled by a wall beyond which is a glacis of earth; beyond that is a moat and, lastly, farther away is a fortified garrison keeping watch in all directions, the royal guard facing to the east and to the south. This town has high gateways, various types of gallery[12] and

7. See 9.55 and 86; 7.55
8. One may also understand that the first street to be laid out is the *maṅgalavīthi* (which surrounds the town, 9.35) or the *brahmavīthi* (which surrounds its central part, 9.37) and that their laying-out must start by their north-east corner.
9. According to *Arthaśāstra* (II.4.3) the widest streets are not to be more than eight pole wide.
10. *Gopura*: these gateways are described in vv.40 sq. *Gopura* is used as a general term to designate any kind of gateway as well as a technical one which designates the gateway of the fifth enclosure (or the more external one) of a temple (see 24.11 . . .).
11. *Sarvajanāvāsasaṅkīrṇam*: literally 'with a mixture of dwellings for all classes of people'.
12. *Mālikā* are long buildings forming 'garlands', hence their name (see chapter 23 note 29, and chapter 26 v.100 and note *ad loc.*).

क्रयविक्रयकैर्युक्तं पुरमुदितं यत् तदेव नगरमिति[39] ।

[खेटादिभेदाः]

शूद्रैरधिष्ठितं यन्नद्यचलावेष्टितं[40] तु तत् खेटम् ॥ २६ ॥
परितः पर्वतयुक्तं खर्वटकं सर्वजनसहितम् ।
खर्वटखेटकमध्ये यज्जनताढ्यं जनस्थानकुब्जम्[41] ॥ २७ ॥
[42]द्वीपान्तरागतवस्तुभिरभियुक्तं सर्वजनसहितम् ।
क्रयविक्रयकैर्युक्तं रत्नधनक्षौमगन्धवस्त्वाढ्यम्[43] ॥ २८ ॥
सागरवेलाभ्याशे[44] तदनुगतायामि पत्तनं प्रोक्तम् ।
परनृपदेशसमीपे युद्धारम्भक्रियोपेतम् ॥ २९ ॥
[45]सेनासेनापतियुतमिदमुदितं शिबिरमिति च वरैः[46] ।
सर्वजनैः सङ्कीर्णं नृपभवनयुतं[47] तदेव तथा ॥ ३० ॥

39. E : नागरं स्यात्
40. E : यन्नन्द्यचलावेष्टितं
41. A (var) : खर्वटखेटकमध्ये यज्जनवासं तु तत् कुब्जम् ।
42. E : omits 28 and 29.
43. A (var) : रत्नधनक्षौमवस्त्राढ्यम्
44. C : वलाह्यासे for वेलाभ्यासे
45.. E : सेनापतियुतमुदितं शिंबिं ह्येतत् कथवरैः
46. A (var) : परैः for वरैः
47. E : गृहवनयुक्तं

temples to all the gods. It is frequented by all sorts of courtesans and has a number of gardens. Elephants, horses, war-chariots and foot soldiers abound.[13] People of all classes (live there). It has gates and posterns[14] and, inside, a great number of dwelling houses as well as the king's palace.

25b-26a However when it is located in a forested country and when it contains dwellings for all classes of people, and shops, it is called *pura* or *nagara*.[15]

Kheṭa *and other types of town*

26b-27 A *kheṭa* is inhabited by śūdra;[16] it is situated in the vicinity of a river or a mountain. A *kharvaṭa* is surrounded by mountains and is inhabited by people of all classes.[17] A *janasthānakubja* is heavily populated and situated between a *kheṭa* and a *kharvaṭa*.[18]

28-29a A *pattana* is a town where products from other countries are to be found; it is inhabited by people of all classes; there are shops and an abundance of merchandise such as precious stones, grains, fine cloth and perfumes; it is situated by the sea and extends along the coast.[19]

29b-30a Sages say that a *śibira* is situated in proximity to the realm of an enemy prince; it is provided with everything necessary for war and it accommodates the army and the commander-in-chief.[20]

13. That is to say the four corps of the army.
14. *Dvāra, upadvāra*; see 9.57-59.
15. It is not clear if this definition is a complement to those of the *nagara kevala* and *rājadhānī* given above (as implied by '*vā*') or a new one which would concern the terms *pura* and *nagara*. In the corresponding passage of the *Mānasāra* (10.27-28) the *nagara* (called *nagarī*) differs from the *pura* by the presence of a royal palace not found in the last.
16. According to *Arthaśāstra* (II.1.2) it is the *grāma* which is inhabited by *śūdra* only.
17. Cf. *arthaśāstra* (II.1.4): aṣṭaśatagrāmyā madhye *sthānīyaṃ* catuḥśatagrāmyā *droṇamukhaṃ* dviśatagrāmyaḥ *kārvaṭikaṃ* daśagrāmīsaṅgrahaṇe *saṅgrahaṇaṃ* sthāpayet.
18. According to *Mānasāra* (10.61-62), this kind of settlement has no ramparts.
19. See v. 91.
20. The definition given here will be well appropriate for the camp (*skandhāvāra*) which the king is to establish before starting the war (*Arthaśāstra* X.1.1 . . .); for the *Mayamata* definition of the *skandhāvāra* see below vv. 35b-36a. See also below 29.1a.

बहुरक्षोपेतं यत् सेनामुखमुच्यते तज्ज्ञैः ।
नद्यद्रिपार्श्वयुक्तं नृपभवनयुतं सबहुरक्षम् ॥ ३१ ॥
यन्नृपतिस्थापितकं तत् स्थानीयं समुद्दिष्टम् ।
[48]नद्यब्धिदक्षिणादक्षिणभाग् वणिगादिसंयुक्तम् ॥ ३२ ॥
[49]सर्वजनावासं यद् द्रोणमुखं प्रोक्तमाचार्यैः ।
[50]ग्रामसमीपे जनतालयमिदमुदितं[51] विडम्बमिति[52] ॥ ३३ ॥
वनमध्ये जनवासं यत् कोत्मकोलकं प्रोक्तम् ।
[53]चातुर्वर्ण्यसमेतं सर्वजनावाससङ्कीर्णम् ॥ ३४ ॥
बहुकर्मकारयुक्तं यन्निगमं[54] तत् समुद्दिष्टम् ।
नद्यद्रिवनसमेतं बहुजनयुक्तं[55] सनृपवासम् ॥ ३५ ॥
एतत् स्कन्धावारं तत्पार्श्वे चेरिका[56] प्रोक्ता ।

[दुर्गाणि]

गिरिवनजल[57]पङ्केरिणदैवतमिश्राणि सप्त दुर्गाणि ॥ ३६ ॥
गिरिमध्यं गिरिपार्श्वं गिरिशिखरं पार्वतं दुर्गम् ।
[58]अजलं तरुवनगहनं वनदुर्गं तदुभयं तु[59] मिश्रं स्यात् ॥ ३७ ॥
[60]दैवं तु सहजदुर्गं पङ्कयुतं पङ्कदुर्गं स्यात् ।
[61]नद्यब्धिपरिवृतं यज्जलदुर्गं निर्वनोदमिरिणं स्यात् ॥ ३८ ॥

48. E : नद्यदक्षिणभाक् बनीजं युक्तं हि शेषजनवासम् ।
49. E : यद्द्रोणमुखं द्रोणमुखेऽभिधानक्रयुगमनादिमुखम्; A (var) : सर्वजनैः सङ्कीर्णं द्रोणयुङ्ग्नदितम् ।
50. A (var) : ग्रामसमीप-
51. E : जन्तोग़लयमुदितं
52. A (var) : तद् विडम्बमिति for विडम्बमिति
53. A (var) : चतुर्वर्णसीमन्तं; E : चतुर्वर्णसमेतं
54. A (var) : निगमं for यन्निगमं
55. A (var), C : बहुजनवासं
56. E : चरीकाः
57. A (var) : गिरिवनजनज
58. A (var) : निर्जल
59. A, (var) : च for तु
60. E : दैवतसहजलदुर्गं पङ्कयुतो नाम पङ्कदुर्गाणि
61. C : नद्यद्रिपरिबृतं

30b-31a According to the sages a *senāmukha* is a place where people of all classes are mixed; it contains a royal palace and is provided with a well fortified garrison.

31b-32a A *sthānīya* is a town founded by the king and situated beside a river or near to a mountain; it comprises a royal palace and a large garrison.[21]

32b-33a What extends (both) along the right and left banks of a river and which is frequented by traders and others and inhabited by people of all classes is called *droṇamukha* by teachers.[22]

33b-34a An inhabited place in the vicinity of a village is a *viḍamba*. An inhabited place in the middle of a forest is a *kotmakolaka*.[23]

34b-35a A *nigama* is a town where the four castes are gathered, where people of all classes live together and where there are a number of artisans.

35b-36a A *skandhāvāra* is near a forested region or a river; it is heavily populated and comprises a royal palace; that which is found next to it is a *cerikā*.[24]

Forts[25]

36b-38 There are seven types of fort: the mountain fort, the forest fort, the water fort, the mud fort, the desert fort, the natural fort and the mixed fort.[26] The mountain fort is built amidst mountains or on the side of a

21. *Sthānīya*: for a more complete definition of this administrative town see *Arthaśāstra* II.1.4 (quoted above note 17), II.1.7, II.35.6, III.1.1 . . . According to *Īśānaśiva* (Kriyā.25.38-39) and *Śilparatna* (5.32-33) the *sthānīya* is a border-town managed by an *antapāla* (literally 'marquis' in the etymological meaning of the term).
22. See above note 17; according to *Īśānaśiva* (Kriyā. 25.38-39) a *droṇamukha* is similar to a *pattana*.
23. According to *Śilparatna* (5.32) a *viḍamba* is inhabited by agriculturists. As for the *kotmakolaka* its inhabitants probably are tribesmen (*kola*) or the like.
24. *Skandhāvāra*: see above note 20; according to *Mānasāra* (10.85-86) and *Īśānaśiva* (Kriyā. 25.37-38) it is a fortified city. *Cerikā*: the term is no more than a sanskritization of Tam.*cēri*; it may designate a suburb inhabited by brahmins (*Mānasāra* 10.87) as well as by weavers (*Kāmika* I.20.15-16); for the various meanings of Tam. *cēri* see F. Gros, *Le Paripāṭal* (Pondichéry 1968), pp. 210-11.
25. *Durga*: the description given here is very similar to that found in *Arthaśāstra* (II.3).
26. The same list is given by *Īśānaśiva* (Kriyā.25.31) and *Śilparatna* (5.8), however both texts replace the *miśradurga* by the *kṛtadurga* ('fort with [man]-made defences'). The *Arthaśāstra* (II.3.1) only lists four forts (*audakadurga, pārvata°, dhānvana°* and *vāna°*), all of them being endowed with natural defences (*daivakṛta*).

अक्षयजलान्नशस्त्रं[62] ह्यतिविपुलोतुङ्गघनसालम् ।
सर्वं हि दुर्गजातं[63] सप्राकारं त्वनेकमुखरक्षम्[64] ॥ ३९ ॥
बहिरुदकरहितवनच्छन्नपथं दुष्प्रवेशं च[65] ।
गोपुरमण्डपयुक्तं सोपानच्छन्नमच्छन्नम्[66] ॥ ४० ॥
द्विकवाटचतुष्परिघार्गल[67] हस्तोन्नतेन्द्रकीलयुतम् ।
सस्थूणमध्यमालयमिण्ठकसहितं[68] सगूढसोपानम् ॥ ४१ ॥
द्वाराणि मण्डपसभाशालाकाराणि कार्याणि ।
द्वादश सालाकाराश्चतुरं[69] वृत्तं तदायतं च पुनः[70] ॥ ४२ ॥
[71]नन्द्यावर्तं कौक्कुटमिभकुम्भं नागवृत्तं च[72] ।
[73]मगनचतुरं त्रिकोणमष्टाश्रं नेमिखण्डं[74] च ॥ ४३ ॥

62. C : अक्षयजलाशयाखं; E : अक्षयजलं नवक्त्रं
63. A, B : दुर्गजालं
64. A (var) : सपरिघमुखरक्षम्
65. A, B, C, E : बहिरुदकं रहितवनं छन्नपथं दुष्प्रवेशं च ।
66. A (var), C : सोपानच्छिन्नमच्छिन्नम्
67. A (var), C : परिघद्वयर्गल
68. E : मर्णकसहितं instead of मिण्ठकसहितं
69. A (var), C : शालाकाराश्चतुरश्रं
70. A (var) : वृत्तमायतं च पुरम्
71. A, B, C : चक्रं वृत्तं
72. E : नाहवृत्तिं च
73. E : अग्निचतुर-
74. E : नेतिखण्डं

mountain or at its summit. The forest fort is situated in a dry place,[27] hidden in a forest. The mixed fort unites the characteristics of the two preceding ones. The natural fort has only natural defences; the mud fort has (ramparts) of mud. The water fort is in the middle of a river or is in the sea. The desert fort is (situated in a place) devoid of trees and of water.

39-40a A fort should contain inexhaustible quantities of water, of food and of weapons; the ramparts are to be very big, very high and extremely thick; it should be impregnable at all points by virtue of its surrounding walls and it is guarded on all sides. Beyond the ramparts is a path, hidden in a forest, which is not waterlogged and is difficult of access.[28]

40b-42a There are gates[29] with stairways, some visible and others secret. Their doors have double leaves and are provided with four bars,[30] with bolts and with a one cubit high clamp. (These gatehouses) are provided with a kind of bretesse[31] which rests in the centre on a pillar and access (to which) is by a secret stairway. These gateways have (a flat roof) like a pavilion, or (an hipped roof) like a hall, or (a wagon-roof) like a house main-building.[32]

42b-43 The ramparts may be built according to one of twelve layouts: square, circular, rectangular, elliptical,[33] *nandyāvarta* shaped or shaped like a cock or like the temporal bone of an elephant or like a coiled snake or square with curved sides, triangular, octagonal or semi-circular.[34]

27. *Ajala*: one may understand perhaps that the forest fort is not to be waterlogged for, according to *Arthaśāstra* (II.3.1) and *Mānasāra* (10.94-95), it is, or may be, surrounded by water.
28. See *Arthaśāstra* II.3.15.
29. *Gopuramaṇḍapa*: the meaning of the compound is not clear. The following description is that of a fortified gateway, which is not at all suggested by '*maṇḍapa*'.
30. The four *parigha* may be defences against elephants (*Arthaśāstra* II.3.28) or closing bars. (*ibid.* II.3.25).
31. *Miṇṭhaka*: cf. *meṇḍhaka* in *Arthaśāstra* (II.3.16); commentaries describe this element as an aedicula overhanging both the faces of the gate and being in the form of a ram's head (see Kangle II p. 73).
32. Cf. chapter 24 (dealing with temple gateways) vv. 88, 90, 93, 97, etc.
33. *Caturaṃ vṛttaṃ tadāyataṃ ca* : *tadāyatam* concerns both the preceding terms.
34. For a similar list see below 29.8b-9 (enclosure walls of palaces) and, for a shorter one, above v.13-14.

प्राकाराश्चेष्टकया द्वादशहस्तोच्छ्रिताहीनाः ।
[75]उत्सेधार्धविशाला मूले भित्तिः ससञ्चारा ॥ ४४ ॥
[76]सालस्याभ्यन्तरतः पांसुचयोपर्यनेकयन्त्रयुतम् ।
परितः परिखोपेतं पांसुचये संहताट्टालम्[77] ॥ ४५ ॥
परितः शिबिरोपेतं नानाजनवाससङ्कीर्णम्[78] ।
नृपभवनसमोपेतं हस्त्यश्वरथपदातिबहुमुख्यम् ॥ ४६ ॥
[79]धान्यैस्तैलैः क्षारैः सलवणभैषज्यगन्धविषम् ।
[80]लोहाङ्गारस्नायुविषाणवेण्विन्धनैर्युक्तम् ॥ ४७ ॥
[81]तृणचर्मशाकयुक्तं सवल्कलं[82] सारदारुयुतम् ।
दुर्गं दुर्गममुक्तं दुर्लङ्घ्यं दुरवगाहं च ॥ ४८ ॥
रक्षार्थं च जयार्थं ह्यरिभिरभेद्यं[83] च दुर्गमिष्टं स्यात् ।
इन्द्रश्च वासुदेवो गुहो जयन्तश्च वैश्रवणः ॥ ४९ ॥
अश्विन्यौ श्रीमदिरे शिवश्च दुर्गा सरस्वती चेति ।
प्राकारान्तर्दिव्या[84] दुर्गनिवेशे[85] च विज्ञेयाः ॥ ५० ॥
एवं दुर्गविधानं सम्यक् प्रोक्तं[86] पुरातनैर्मुनिभिः ।

75. C : उत्सेधाय विशाला
76. A, C, E : सर्वस्या-, B : सर्वत्रा
77. A (var) : संयुक्ताट्टालम्
78. E : सुकीर्णम्
79. A (var), E : धान्यस्नेहक्षारं
80. E : लोहाङ्गारविष्टासनायुविषाणाश्चीन्धनैर्युक्तम् ।
81. A, B, C, E : तृणचर्मकारयुक्तं
82. A (var), C : वल्लरैः instead of सवल्कलं
83. E : हरिहरभद्राश्च pour ह्यरिभिरभेद्यं च
84. E : प्राकारान्तर्दिह्या
85. C : दुर्मुनिवेशे
86. C : प्रोक्तं हि for सम्यक् प्रोक्तं

44-46a Brick ramparts are at least twelve cubits high and are twice as high as thick; the wall has a passable road at its base;[35] inside the ramparts are all kinds of war machines set up at elevated points.[36] All around is a moat and on its earthen bank are towers connected (with the wall); and beyond, and all around this, is a camp.[37]

46b-48a The fort is inhabited by people of diverse classes and contains the palace of the king. Present here are numerous elephants, horses, war-chariots and foot-soldiers. It is abundantly provided with grain, oil and molasses, as with salt, medicaments, perfumes and poisons and with metals, charcoal, gut, ivory, bamboo and combustibles such as fodder and with leather, vegetables, barks and hard woods.[38]

48b-49a A fort must be inaccessible, proof against attack and impregnable; it is constructed for defence and victory and must be impenetrable by enemies.

49b-50 Indra, Vāsudeva, Guha, Jayanta, Vaiśravaṇa, Aśvin, Śrī and Madirā, Śiva, Durgā and Sarasvatī: these are the deities who are to be honoured within the walls and who should be borne in mind when a fort is built.[39]

35. *Mūle bhittiḥ sasañcārā*: see *arthaśtra* II.3.7: *vaprasyopari prākāraṃ viṣkambhadviguṇotsedham aiṣṭakaṃ dvādaśahastād ūrdhvam ojaṃ yugmaṃ vā ā caturviṃśatihastād iti kārayet,* rathacaryāsaṃcāraṃ *tālamūlaṃ murajakaiḥ kapiśīrṣakaiś cācitāgram.*
our translation (slightly different from the one given by Kangle, *op. cit.* II p. 71):
"On the top of the glacis he should cause a wall to be built, twice high as broad, made of bricks, from twelve cubits to twenty-four, either in odd or even (number of cubits); that wall is inaccessible to carts, it is shaped as a palmtree foot (i.e. wider at the base than at top) and topped by (copestones shaped like) drums and monkey heads".
The glacis (*vapra*) is made with the mud extracted from the moat (II.3.5); it is to be *accessible to the carts* (as the passable way placed by the *Mayamata*) at the bottom of the rampart, which is not the case of the wall itself (*prākāra*) which is 'inaccessible to carts' (*rathacaryāsaṃcāra*).
36. These war-machines are the 'fixed machines' (*sthitayantra*) listed in *Arthaśāstra* (II.18.5).
37. *Śibira*: see above v. 22.
38. The hard woods are used in construction works (see 15.64 sq., 16.17, etc.).
39. Some of those gods are named in the corresponding list given in *Arthaśāstra* II.4.17: Aparājita, Apratihata, Jayanta, Vaijayanta, Śiva, Vaiśravaṇa, the two Aśvin, Śrī and Madirā; a commentary (quoted in Kangle II, p. 80) explains the four first names as those of Viṣṇu, Indra, Indra's son and Skanda, which is confirmed by *Mayamata* where we find in a different order Indra, Viṣṇu-Vāsudeva, Guha-Skanda and Aindra (=Jayanta see above 8.4).

[नगरविन्यासः]

सर्वेषां विन्यासं संक्षेपाद् वक्ष्यते क्रमशः ॥ ५१ ॥

प्राक्प्रत्यग्गतमार्गा द्वादश दश वाऽष्ट षट्चतुर्युगलम्[87] ।

[88]तावदुदीचीनास्ते तत्रैवायुग्मसंख्या वा[89] ॥ ५२ ॥

एकादशनवसप्त[90]कपञ्चगुणा वैकमार्गा वा[91] ।

युग्मायुग्मपदेषु द्व्येकत्रिभिरंशकैरजांशाः स्युः ॥ ५३ ॥

नगरादीनामेवं मार्गाण्युदितानि सर्वेषाम् ।

[92]दण्डवदेका वीथी तद्दण्डकमित्यभीष्टं स्यात् ॥ ५४ ॥

[93]उत्तरदिङ्मुखमेकं तन्मध्ये संप्रयुक्तं चेत् ।

कर्तरिदण्डकमुदितं प्राचीनौ[94] कुट्टिमौ तर्हि[95] ॥ ५५ ॥

तद् [96]बाहुदण्डकं स्याद् दिक्षु चतुर्द्वारसंयुक्तम् ।

बहुकुट्टिमसंयुक्तं मध्ये[97] वीथ्या द्विपार्श्वे तु[98] ॥ ५६ ॥

शेषं पूर्ववदिष्टं कुटिकामुखदण्डकं प्रोक्तम् ।

प्राचीनोदीचीनैर्मार्गैस्त्रिभिरेव संयुक्तम् ॥ ५७ ॥

तत् [99]कलकाबन्धदण्डकमिति तज्ज्ञैः समुद्दिष्टम् ।

प्राङ्मुखवीथ्यस्तिस्रश्चोत्तरमार्गास्त्रयश्चैव ॥ ५८ ॥

एकैकान्तरितास्ते कुट्टिममार्गास्त्वनेकाश्च ।

[100]वेदीभद्रकमुदितं नगरादीनामिदं शस्तम् ॥ ५९ ॥

स्वस्तिकमुदितं ग्रामे यथा तथा स्वस्तिकं[101] विद्यात् ।

प्रागुत्तरमुखमार्गाः षट्षडभीष्टास्तु[102] तद्बाह्ये ॥ ६० ॥

87. E : षट्चतुर्युगलाः

88. A (var), C : तावदुदीचेवास्ते; E : तावदुदिते चनास्ते

89. A (var), C : या for वा

90. E : हस्त for सप्त

91. A (var) : गुणो चैकमार्गा वा

92. E : दण्डवदेकावधि तद् दण्डमेवजन्तुरिष्टं स्यात् ।

93. E : उत्तरदिङ्मुखमेतत् तन्मध्ये वप्रयुक्तं स्यात् ।

94. A (var) : प्राचीनौ तौ

95. E : तस्मात्

96. C : बहु for बाहु

97. A (var) : मध्यं; E : मध्यम-

98. C : वीथ्याब्धिपार्श्वे तु

99. E : कत्रुकलबलदण्डकमिति

100. C : वेदिर्भद्र- for वेदीभद्र-

101. E : यदा तदा च वस्तिकं

102. E : षट्षड्भिरन्तं

51a Such is the organization of forts as prescribed by the sages of old.

Town planning

51b I now present the plans of all (towns) one after another.

52-53 Streets which go from east to west number twelve, ten, eight, six, four or two and the same numbers are suitable for those which go from north to south. In odd numbers there are eleven, nine, seven, five, three or one streets (in each direction). According to whether the diagram is in even or odd numbers, the number of squares for Aja is two, three or one (?).[40]

54-61 Streets are now indicated for all towns and cities. When there is one single street which is straight this is a *daṇḍaka* plan; if (this street), at its centre, crosses another coming from the north, this is a *kartaridaṇḍaka* plan.[41] If there are two paved streets starting from the east, this is a *bābudaṇḍaka* plan. If there are gates at the four cardinal points and a large number of paved streets on either side of the main street this is a *kuṭikāmukhadaṇḍaka* plan which is otherwise as above. When there are three streets towards the east and three towards the north the sages say this is a *kalakābandhadaṇḍaka* plan. If there are three streets towards the east separated from each other by several alleys this is a *vedibhadra* plan suitable for all types of town. It should be known that the *svastika* plan is the same as for village of that name;[42] it comprises

40. Aja is Brahmā; however we do not see how he can occupy two or three squares on a diagram.

41. See 9.41-42

42. See 9.43-46 and Fig. 7 (p. LI).

प्रागिव मार्गोपेतं वीथिपदं स्वस्तिकं चैव[103] ।
प्राचीनोदीचीनाश्चत्वारश्चैव मार्गाः स्युः ॥ ६१ ॥
[104]ब्रह्मावृतपथमेकं कुट्टिममार्गास्त्रयः प्राच्याम् ।
एतद् भद्रकमुदितं नाम्ना नगरादिविन्यासम् ॥ ६२ ॥
प्राङ्मुखमार्गाः[105] पञ्चैवोत्तरमार्गास्तथैव स्युः[106] ।
बहुकुट्टिमसंयुक्तं भद्रमुखं नाम वस्तु स्यात् ॥ ६३ ॥
प्राचीनास्तु षडेवैवोत्तरवक्त्रास्तथा[107] मार्गाः ।
यद् बहुकुट्टिमयुक्तं तद्वस्तु च[108] भद्रकल्याणम् ॥ ६४ ॥
पूर्वापरमुखमार्गाः सप्तैवोदङ्मुखाश्च तथा[109] ।
शेषं प्रागिव सर्वं विन्यासं तन्महाभद्रम् ॥ ६५ ॥
[110]अष्टौ पूर्वमुखास्ते मार्गाश्चाष्टावुदग्वक्त्राः ।
द्वादशमार्गोपेतं बह्वर्गलकुट्टिमैर्युक्तम् ॥ ६६ ॥
यत् तद् वस्तुसुभद्रं नाम्ना विन्यासमुद्दिष्टम् ।
नवनवमार्गाश्चैते प्राचीनाश्चाप्युदीचीनाः ॥ ६७ ॥
द्वारोपद्वारयुतं कुट्टिममार्गार्गलैर्युक्तम् ।
राजगृहोपेतं यन्नगरं नाम्ना जयाङ्गं स्यात् ॥ ६८ ॥
प्राचीना दश मार्गाश्चोत्तरमार्गास्तथैव स्युः ।
नृपमन्दिरसंयुक्तं [111]युक्त्यानेकार्गलोपेतम् ॥ ६९ ॥
बहुकुट्टिमसंयुक्तं विजयं नाम्ना वरैः प्रोक्तम् ।
प्राचीनास्त्वेकादश मार्गा रुद्रा उदीचीनाः ॥ ७० ॥
ब्रह्मांशादपरांशो[112] यदभीष्टं तत्र नृपवासम् ।
[113]तन्मुखतोऽदभ्रमहाङ्गणकं स्यादिष्टभगे तु ॥ ७१ ॥

103. A (var): चैतत्
104. C: ब्रह्मादितपदमेकं
105. E: मार्गं
106. E: तथैवासुः
107. C: षडेवोत्तरवक्त्रं तथा
108. A (var): omits च
109. C: मुखा मार्गाः for मुखाश्च तथा
110. E: अष्टौ पूर्वमुखास्तौ मार्गावष्टाष्टकप्युदकवक्त्राः
111. E: युक्ता- for युक्त्या
112. A (var): अपरांशे
113. E: तदुन्नतो वप्रमहाकणकस्यन्दिष्टमेव भागस्तु

however, at most, six streets going east and six going north and, as has been mentioned above, the layout of the principal roads is that of a *svastika*.

62 When there are four streets going north, one around the place of Brahmā,[43] and three paved streets towards the east it is a *bhadraka* plan which is suitable for all types of town.

63-70 When there are five streets going east and as many north as well as a large number of alleys this is a *bhadramukha* plan; when there are six streets going east and as many north as well as a large number of alleys this is a *bhadrakalyāṇa* plan. When there are seven streets from east to west and as many proceeding from the north, the rest being as above, this is a *mahābhadra* plan. When there are eight streets going east, eight north, twelve other streets and a great number of cul-de-sacs and alleys this is said to be a *vastusubhadra* plan. If a town comprises nine streets going east and nine north as well as gates, posterns, alleys and cul-de-sacs and a royal palace it is called *jayāṅga*. A town which comprises ten streets proceeding from the east and as many from the north, which contains a royal palace and where there are numerous alleys arranged according to the specific circumstances, such a town is named *vijaya* by the sages.

71-75a (In the *sarvatobhadra* plan) there are eleven streets from the east and eleven from the north; the king's palace is to be found, as is convenient, to the west of the place of Brahmā;[44] in front of it is a huge empty yard; queen's dwelling is in the chosen place and all that remains is arranged as expedient. Streets which proceed (from the place of Brahmā in the centre) towards the north and east are the royal streets;[45] on either side of these are rows of gallery-like buildings[46] intended for

43. It is the *brahmavīthi* (9.37).

44. According to *Arthaśāstra* II.4.7 (vāstuhṛdayād uttare navabhāge yathoktavidhānam antaḥpuraṃ prāṅmukhaṃ udaṅmukhaṃ vā kārayet) it seems that the king's lodging and its annexes (listed afterward) occupy nine squares of the eighty-one square diagram and that these squares are located to the north of the diagram central square. *Mayamata* which locates the king's lodging to the west does not give any hint about the precise position of the annexes. See below 29.12b-13.

45. *Rājavīthi*: cf. 9.37.

46. *Mālikāpaṅkti*: see above note 12.

तत्रान्तःपुरवासं शेषं सर्वं[114] समुन्नेयम् ।
[115]तत्प्रागुद्गतमार्गा[116] सा कथिता राजवीथीति ॥ ७२ ॥
[117]तस्या द्विपार्श्वयोः स्यात् सैश्वर्याणां तु[118] मालिकापङ्क्तिः ।
तत्पार्श्वयोर्निवासो वणिजां स्यात् तस्य दक्षिणतः ॥ ७३ ॥
स्यात् तन्तुवायवासं ह्युत्तरतश्चक्रिणां वासम् ।
तत्तज्जात्यन्तरगृहमथ तत्सामीप्यतः[119] कुर्यात् ॥ ७४ ॥
शेषं प्रागिव सर्वं योग्यं तत् सर्वतोभद्रम् ।
[120]एवं षोडश भेदा ह्युदिताश्चाद्यैर्मुनीन्द्रैस्तु ॥ ७५ ॥
मार्गच्छेदं नेष्टं पदमध्ये चत्वरं न स्यात्[121] ।
शेषं युक्त्यानुक्तं सम्यग् योज्यं नृपेच्छया तज्ज्ञैः ॥ ७६ ॥
क्षुद्राणामपि चैषां मध्यानां चापि सर्वेषाम् ।

[अन्तरापणम्]

[122]तत्र कुटुम्बावलिकं वक्ष्येऽहं चान्तरापणकम् ॥ ७७ ॥
परितो रथपथयुक्तं मध्ये वणिजां गृहश्रेणी ।
तद्दक्षिणतः पार्श्वे गेहं स्यात् तन्तुवायानाम् ॥ ७८ ॥
[123]उत्तरतस्तद्वासावलिकं स्याच्चक्रिकाणां तु ।
कर्मोपजीविनां स्याद् वासं रथपथ्यनेकानाम् ॥ ७९ ॥
ब्रह्मावृतपथमेकं तत्रान्तरापणं कार्यम् ।
ताम्बूलादि फलं च प्रोक्तं सारान्वितं द्रव्यम् ॥ ८० ॥
ईशानादिमहेन्द्रद्वारान्तं [124]चान्तरापणकम् ।
तत्रैव मत्स्यमांसं शुष्कं शाकं[125] च विज्ञेयम् ॥ ८१ ॥

114. E : युक्त्या for सर्वं
115. A (var) : तत्प्राग्दिग्गतमार्गा सा राजवीथिका कथिता ;
E : तत्तत्प्राग्गतमार्गाः सत्यं सा राजवीथिका कथिता ।
116. C : मार्गं
117. E : तस्याब्धिपार्श्वयोः
118. A (var) : omits तु
119. A (var), C : सामीप्यतः for तत्सामीप्यतः
120. A (var), C : एवं षोडश भेदान्युदितान्याद्यैर्मुनीन्द्रैस्तु ।
121. E : चत्वरं तस्य
122. E : तत्र कुसुम्बावलितं तं वक्ष्येऽहं यथान्तरपणकम् ।
123. C : उत्तरतस्तद्वासं स्थापितं
124. C : वान्तरापणकम्
125. E : पाकं for शाकं

the royal retinue; beyond them and on both sides is the quarter of the merchants and to the south of that the quarter of the weavers whilst that of the potters is to the north and, beside this, the quarters for each of the lower castes. The rest is to be as ordained above; this is the *sarvatobhadra* disposition.

75b-76 Such are the sixteen varieties of town prescribed by the sages of old. A street should not be interrupted nor a crossroads established at the centre of a town plan. Anything which has not been laid down should be carried out by the sages in accordance with the wishes of the king.

Bazaars

77-79 Now I lay down the disposition for inhabited quarters and for bazaars appropriate to all types of towns. On the periphery is the chariot road and inside it is the merchants' quarter;[47] to the south of this is the weavers' quarter and to the north that of the potters; a great many other artisans are installed along that road.

80-86a A street encircles the place of Brahmā and it is there that the bazaar for betel and similar produce, for fruits and for articles of value should be installed. Between the square of Īśa and the Mahendra gate is the bazaar for meat, fish, (dried) products and for vegetables; between the Mahendra gate and the square of Agni is the bazaar for solid and liquid foods; the ironmongers are between the Agni square and that of Gṛhakṣata[48] between this last and that of Nirṛti are the coppersmiths; between the square of Pitṛ and that of Puṣpadanta is the clothing bazaar;

47. The chariot road is the *maṅgalavīthi* (9.35) and the houses of merchants are to be on its inner side (that is to say not against the wall). See Fig. 8 (p. LII).

48. Gṛhakṣata square corresponds to a gate (as well as those of Puṣpadanta and Bhallāṭa mentioned below).

महेन्द्राद्यग्न्यन्तं[126] भक्ष्यं भोज्यं च निर्दिष्टम् ।
[127]अग्न्यादि गृहक्षतपर्यन्तं तत्र भाण्डानि[128] ॥ ८२ ॥
तस्मान्निर्ऋतिपदान्तं[129] कंसादिकमत्र विज्ञेयम् ।
स्यात् पुष्पदन्तभागान्तं[130] पितृभागादि वस्त्रं स्यात् ॥ ८३ ॥
तस्मात् समीरणान्तं तण्डुलधान्यादिकं च कटम्[131] ।
स्याद् भल्लाटपदान्तं वाय्वादि कं वस्त्रकादीनाम्[132] ॥ ८४ ॥
तत्रैव लावणादिद्रव्यं तैलादिकं ज्ञेयम्[133] ।
[134]तस्मादीशपदान्तं गन्धं पुष्पादिकं विहितम् ॥ ८५ ॥
[135]एवं नवान्तरापणमुदितं तत्परितस्तु मध्ये[136] ।
[137]अभ्यन्तरगतमार्गेष्वथ रत्नं हाटकं वस्त्रम् ॥ ८६ ॥
माञ्जिष्ठं तु[138] मरीचं पिप्पलकं चापि हारिद्रम्[139] ।
[140]मधुघृततैलादिकमथ भैषज्यं सर्वतः कार्यम्[141] ॥ ८७ ॥
आर्यपदे च विवस्वति मित्रे पृथिवीधरे च पदे ।
[142]शास्ता दुर्गा गजमुखलक्ष्म्यौ चात्रैव[143] विज्ञेयाः ॥ ८८ ॥
देवालयमथ परितो[144] ग्रामे यथा तथा विहितम् ।
परितः सर्वजनालयमुदितं किञ्चित् ततो दूरे ॥ ८९ ॥
नगराद् द्विशतं दण्डं नीत्वा प्राच्यां तु वाग्नेय्याम्[145] ।
चण्डालकुटीराणि तत्रैव तु [146]कोलिकानां तु[147] ॥ ९० ॥

126. C : अग्निपादान्तं for अग्न्यन्तं
127. A, B : अग्न्यादिक्षतगृहपर्यन्तं
128. A (var), C : भाण्डादि
129. C : पादान्तं for पदान्तं
130. C : भागान्तमपि
131. A (var) : तण्डुलमथ धान्यकं च कटकम्
132. C : वस्त्रवादीनाम्
133. A (var), C : तैलादिभैषज्यम्
134. C : तस्मादकपदान्तं सौगलं कुसुमादिविज्ञेयम् ।
135. C : एवं तलान्तरापणमुदितं परितस्तु मध्ये तु ।
136. A (var), E : मध्ये तु
137. E : अभ्यन्तरगतमार्गेष्वथायस्तं हाटकादिकं वस्त्रम् ।
138. A (var) : च; C : चापि
139. E : पिप्पलिनं द्वयं च हरिद्रम्
140. E : मधुघृततैलप्रभृति
141. E : कुर्यात्
142. E : देशे शस्तदुर्गा गजमुखलक्ष्मसत्वयात्र विज्ञेया ।
143. A (var) : लक्ष्म्यश्चात्रैव
144. A (var) : अतः परितो; C : पत्तरितो; E : अध्यपरितो
145. A (var) : चाग्नेय्याम्
146. C : कौलिकानां
147. A (var) : च

between this last and the square of Samīraṇa is the bazaar for grains, rice and fodder. Between the square of Vāyu and that of Bhallāṭa is the bazaar for fabrics and materials of that kind and there is too the bazaar for foodstuffs such as salt and oil; between this and the square of Īśa is the bazaar for perfumes, flowers . . . etc. Such are the nine bazaars established in the centre and on the periphery (of the town).

86b-87 Along the streets leading to the centre is the bazaar where are found gems, gold, clothes, madder, black pepper, peepul seed and orpiment as well as honey, ghee, oil and medicaments.

88-90 Śāstṛ, Durgā, Gajamukha and Lakṣmī should be worshipped at the places, (respectively), of Ārya, Vivasvant, Mitra and Pṛthivīdhara. Beyond this the temples are placed all around as in a village.[49] Houses for people of all castes are installed a little farther away. The caṇḍāla and kolika huts must be two hundred poles beyond the town to the east and south-west.

49. See 9.63 sq.

[148]अस्मिन् सर्वमनुक्तं ग्रामे तु यथा तथा विहितम् ।
[149]पत्तनमृजुवीथियुतं नैव स्यादन्तरा॒णं तत्र[150] ॥ ९१ ॥
शेषाणामपि तत्तद्योग्यवशात्[151] तत्र विज्ञेयम् ॥ ९१½ ॥
स्थानीयदुर्गपुरपत्तनकोत्मकोल-
द्रोणामुखानि निगमं च तथैव खेटम् ।
ग्रामं च खर्वटमितीह दशैव[152] युक्त्या-
धिष्ठानकानि कथितानि पुरातनार्यैः ॥ ९२ ॥
एवं प्रोक्तं भूमिदेवादिकानां
वर्णानां चाप्यत्र जात्यन्तराणाम् ।
ग्रामादीनां मानविन्यासमार्गं[153]
सालङ्कारं चारु संक्षिप्य तन्त्रात् ॥ ९३ ॥
[154]दत्तान्नृपः स्थपतिकादिचतुष्टयेभ्यो
मानादिकर्मनिपुणेभ्य इडां च गाश्च ।
नित्यं यथा जगति वित्तमनेकवस्तू-
न्या[155] चन्द्रतारमधिवासभुवं[156] मुदा सः ॥ ९४½ ॥

इति मयमते वस्तुशास्त्रे नगरविधानो नाम
दशमोऽध्यायः

148. C : तस्मिन्
149. E : पत्तनरज्जुसृजुवीथियुक्तं चैव स्यादन्तरपणं तत्र
150. A (var) : नैवान्तरपणं तत्र
151. C : तत्तद् भूयोग्यवशात्
152. A (var) : खर्वटमिदयशैव
153. A (var), : चात्रविन्यासमार्गम्
154. A, C : धृतान्नृपः ; E : यत्तोनृपः
155. A (var), C : वस्त्रमा- for वस्तून्या-
156. A (var) : अपि वासभुवं for अधिवासभुवं

91 Everything not indicated here should be arranged as has been prescribed for villages. A *pattana* has one straight road where no bazaars are to be found;[50] for all other (towns) the bazaars should be established according to each specific case.

92 *Sthānīya, durga, pura, pattana, kotmakolaka, droṇamukha, nigama* as well as *kheṭa, grāma* and *kharvaṭa*: these are the ten types of settlement established according to circumstance and they have been described by the sages of old.

93 The measurements, plans and streets suitable for villages and other settlements are described according to the Tantra. These are intended for the classes, the first of which is the brahmin class, and for inferior castes.

94 The generous prince gives land and cows to the tetrad led by the architect and practised in work such as measurement. If he does this without reservation, riches in abundance will be his and his realm will stretch to the moon and stars as long as the world shall endure.

Thus ends, in the *Mayamata*, treatise on dwelling,
the tenth chapter: RULES FOR TOWNS.

50. The *pattana* is a commercial town (vv. 28-29) and it is strange that it is not to contain bazaars; however it is perhaps to understand that the *pattana* being built along a shore according to a linear pattern, shops cannot be arranged in bazaars as it is the case in centred plan settlements.

अथैकादशोऽध्यायः[1]

[भूलम्बविधानम्]

[2]भूमिलम्बविधानं[3] तु वक्ष्ये संक्षेपतः क्रमात् ।
चतुरश्रमायताश्रं वर्तुलं च तदायतम्[4] ॥ १ ॥
अष्टाश्रं च षडश्रं च द्वयश्रवृत्तं तथैव च ।
एतद् विन्यासभेदं[5] स्यात् क्षयवृद्धिविधानतः[6] ॥ २ ॥
भूमिलम्भमिति प्रोक्तं त्रिचतुर्हस्तमानतः ।
द्विद्विहस्तविवृद्ध्यैकं भूमेर्मानं चतुष्टयम् ॥ ३ ॥
पञ्चषड्ढस्तमारभ्य द्विद्विहस्तविवर्धनात् ।
द्वितले तु चतुर्मानं रुद्रभानुकरान्तकम् ॥ ४ ॥
सप्ताष्टहस्तमारभ्य द्विद्विहस्तविवर्धनात् ।
पञ्चदशविकारान्तं त्रितले पञ्चमानकम् ॥ ५ ॥
नवपङ्क्तिकराद् यावत् पक्षषोडशहस्तकम् ।
चतुष्पञ्चतलं प्रोक्तं चतुर्मानं सनातनम्[7] ॥ ६ ॥
एकहस्तं द्विहस्तं वा क्षुद्रमेकतलं स्मृतम्[8] ।
युग्मायुग्मकरैर्मानैर्हस्तार्धोनसमन्वितैः[9] ॥ ७ ॥
केचिद् वदन्ति देवानां मानुषाणां विमानके ।
विस्तारे सप्तषट्पञ्चचतुस्त्र्यंशेऽधिकं त्रिभिः ॥ ८ ॥

1. Chapter missing in D and F
2. E : omits 1 and 2.
3. C : भूमिलम्बस्य विधानं
4. A (var), C : तदाश्रयम्
5. C : भेदः for भेदं
6. A (var) : विधानकम्
7. C : सनातनैः
8. A (var), E : मतम्
9. A (var), C : हसार्धोनसमुन्नतैः

CHAPTER 11

THE NUMBER OF STOREYS AND THE DIMENSIONS[1]

1-3a. Now I give in full, and systematically, the rules relating to the number and dimensions of storeys. There are differences (between the buildings) due to the layout of the plan, according to whether it is square, rectangular, round, elliptical, octagonal, hexagonal or apsidal.[2] (Other variations) are due to increases or diminutions (in the number of storeys) and this is called *bhūmilamba*.

3b-7a There are four (possible) widths for single storeyed buildings, starting from three or four cubits and increasing successively by two cubits. For two storeyed buildings there are four (possible) widths, from five or six cubits to eleven or twelve with successive increments of two cubits. There are five possible widths for three storeyed buildings, from seven or eight cubits to fifteen or sixteen by successive increments of two cubits. Going from nine or ten cubits to fifteen or sixteen[3] there are four (possible) widths for four and five storeyed buildings and so on. Lastly, it is stated that a very small single storeyed building measures one or two cubits.

7b-8a Some say that in houses, divine or human, the measurements may be given in an odd or even number of cubits and that half a cubit may be added to or subtracted from (that prescribed number).[4]

1. See *Mānasāra* (chapter 11), *Īśānaśiva* (Kriyā. 30.1-35, 50-53), *Ajita* (12.46-60) and below chapters 19 to 22 where are described buildings with one to twelve storeys.
2. *Dvyaśravṛtta*: literally 'round with two straight sides'; the term is used as well as metaphoric ones such as *gajapṛṣṭha* or *hastipṛṣṭha* to designate buildings whose square or rectangular plan comprise an apse on the side opposite to the entrance (for descriptions see below 19.32 or 20.25). This type of building is quite common (e.g. so-called 'caitya halls' of Karle, Bhaja . . ., Sahādevaratha at Mahabalipuram, Śāstṛ temples in Kerala and several others).
3. *Vikāra*='sixteen' for according to Sāṅkhya *prakṛti* gets sixteen vikāra.
4. This may be to obtain dimensions in accord with *āyādi* (cf. 9.18 sq.).

[10]शान्तिकं पौष्टिकं जयदमद्भुतं सार्वकामिकम् ।
[11]उच्छ्रयं द्विगुणं [12]पादार्धाधिकं चापि सम्मतम् ॥ ९ ॥
पञ्चदशकर[13] व्यासाद्धीनं क्षुद्रविमानकम् ।
[14]सप्ताष्टाधिकपङ्क्त्यादि द्विद्विहस्तविवर्धनात् ॥ १० ॥
[15]आसप्ततेश्चतुर्भूम्यादीनि त्रीणि मतानि च ।
सप्तविंशतिभेदानि द्वादशान्तान्यनुक्रमात् ॥ ११ ॥
[16]त्रिचतुर्विंशतिरत्नेर्यावच्छतकरान्तकम् ।
त्रित्रिहस्तविवृद्ध्या तु त्रिनवोत्सेधमिष्यते ॥ १२ ॥
एवमुत्कृष्टमानेषु[17] श्रेष्ठमध्याधमं भवेत् ।
त्रिचतुष्पङ्क्तिहस्तादि[18] द्विद्विहस्तविवर्धनात् ॥ १३ ॥
पञ्चषट्षष्टिहस्तान्तं संख्यया पूर्वसंस्कृतिः[19] ।
[20]चतुस्तलविमानादि[21] द्वादशान्तं विधीयते ॥ १४ ॥
सप्ताष्टपङ्क्तेरारभ्य त्रित्रिहस्तविवर्धनात्[22] ।
पञ्चषण्णवतिर्यावदुच्चं प्रागिव संख्यया ॥ १५ ॥
[23]श्रेष्ठमध्यकनिष्ठं स्यादेवं मध्यक्रमेषु च[24] ।
नवपङ्क्तिकरात् पञ्चषट्पञ्चाशत्करान्तकम् ॥ १६ ॥
द्विद्विहस्तविवृद्ध्या तु चतुर्विंशतिसंख्यया ।
पञ्चादिद्वादशान्तानां हर्म्याणां विपुलं क्रमात्[25] ॥ १७ ॥

10. E : कान्तिकं for शान्तिकं
11. A (var) : उच्छ्रयं द्विगुणपादार्धादधिकं चापि सम्मतम्
12. E : द्विगुणात्
13. E : कन for कर
14. A (var), C : सप्तदशाष्टदशादि
15. E : आसप्ततेश्चतुर्भूम्यां त्रीणि त्रीणि कृतानि च ।
16. C : त्रिचतुर्विंशतिकरादिः स्याच्छतकरान्तकम् ।
17. A (var) : माने तु
18. E : विस्ताराद् for हस्तादि
19. A (var) : पूर्ववत् ततः
20. C : चतुःस्थाल-
21. E : विमानं
22. A (var) : द्विद्विहस्तविवर्धनात्
23. E : omits 16-17a.
24. A (var) : वा
25. A (var), E : मतम्

8b-9 The height is ten sevenths, nine sixths, eight fifths, seven fourths or six thirds the width (according to whether the buildings are of) *śāntika*, *pauṣṭika*, *jayada*, *adbhuta* or *sārvakāmika* (category);[5] or, equally, the height may be double or one and a half times or one and a quarter times the width.

10-11 Buildings which are less than fifteen cubits wide are the 'small' buildings. Going from seventeen or eighteen cubits to seventy by successive increments of two cubits, twenty-seven possible (widths) are obtained for buildings of four to twelve storeys with three (varieties for each of them).[6]

12-13 Going from twenty-three or twenty-four cubits to one hundred[7] by successive increments of three cubits, twenty-seven corresponding heights are obtained. This goes for the larger buildings of which there are three varieties: superior, medium and inferior.

14-16a Going from thirteen or fourteen cubits to sixty-five by successive increments of two cubits, the same number (of widths) as above is obtained for four to twelve storey buildings. Going from seventeen or eighteen cubits to ninety-five or ninety-six by successive increments of two cubits, the corresponding number of heights is obtained. There are three varieties (of each of these buildings which are medium sized): the superior, the medium and the inferior.

16b-17 Going from nine or ten cubits to fifty-five or fifty-six by successive increments of two cubits, twenty-four (possible) widths are obtained for buildings of five to twelve storeys (of inferior size).

5. See 19.2-3 where *sārvakāmika* mode is omitted and where proportions are slightly different.
6. That is to say that four storey buildings make up seventeen, nineteen or twenty-one cubits, five storey buildings twenty-three, twenty-five or twenty-seven . . . etc.
7. The exact figures would have been one hundred one or one hundred two; however it is prescribed later buildings are not be more than one hundred cubit high (v. 26).

[26]सप्ताष्टनवभूमानां धाम्नामुक्तप्रमाणतः[27] ।
युञ्ज्याद् द्वादशभूम्यन्तं विमानं मानविद्वरः[28] ॥ १८ ॥
द्विःषट्[29] त्रयोदशक्ष्मान्तषोडशक्ष्मं यथाक्रमम् ।
[30]षट्षट्षट्सप्तपञ्चाशद्धस्तव्यासैः शिवोदितम् ॥ १९ ॥
[31]विस्तारं स्तम्भतो बाह्ये जन्मात्[32] स्थूप्यन्तमुन्नतम् ।
केचिदाशिखरान्तं तु प्रवदन्ति तदुन्नतम्[33] ॥ २० ॥
महतामुच्छ्रयो हस्तैरुद्देशः समुदाहृतः ।
तत्तद्व्यासे तु[34] सप्तांशे निर्देशोच्चं त्रियंशकैः ॥ २१ ॥
विस्तारद्विगुणोत्सेधं[35] युक्त्याल्पेषु प्रयोजयेत् ।
देवानां सार्वभौमानामाद्वादशतलं विदुः ॥ २२ ॥
रक्षोगन्धर्वयक्षाणामेकादशतलं मतम् ।
विप्राणां नवभौमं स्याद् दशभौममथापि वा ॥ २३ ॥
युवराजस्य राज्ञश्च पञ्चमस्यैव सप्तभूः[36] ।
तदाद्येकादशतलं षण्णां वै चक्रवर्तिनाम् ॥ २४ ॥
[37]त्रिभूमं च चतुर्भूमं वणिजां शूद्रजन्मनाम् ।
राज्ञां पञ्चतलं वाऽपि मतं पट्टभृतां तु तत् ॥ २५ ॥

26. A (var) and E add :
सप्ताष्टदशहस्तादित्रित्रिहस्तविवर्धनात् ।
षट्सप्ताशीतिहस्तान्तमुत्सेधं पूर्ववन्नयेत् ।
श्रेष्ठमध्यकनिष्ठानि प्रोक्तान्यल्पक्रमे क्रमात् ।
27. C : सप्ताष्टनवभेदेन मानं धाम्नां प्रमाणतः
28. A (var) : मानवद्वरम्
29. A (var) : त्रयोदशाक्षं च षोडशत्रयथाज्ञम्
30. E : षट् सप्तकपञ्चाशत् हस्तव्यासाशिवोदितम् ।
31. A (var), C : विस्तार-
32. C : जन्मा-
33. A (var) : तदुत्तमम्
34. E : व्यासेन for व्यासे तु
35. A (var) : गुणोपेतं for गुणोत्सेधं
36. E : युवराजस्य राज्ञश्च सप्तषट्पञ्चभूमकम् ।
37. A (var), C : त्रिभौमं च चतुर्भौमं

18-19 He who is well versed in calculating proportions should construct buildings of (ten) to twelve storeys, with the aid of the proportions given for those which have seven, eight, or nine storeys. Temples with twelve, thirteen or, at most, sixteen storeys are, respectively, thirty-six, forty-two and fifty cubits wide and are consecrated to Śiva.

20 The width is to be measured along the exterior face of the pillars[8] and the height from the base up to the finial, yet some say that the height is measured (only) up to the top of the roof.

21-22a The heights of large buildings have been given in cubits and they should be ten sevenths the corresponding widths. Where small buildings are concerned the rule to be followed is that their height is double their width.

22b-25 It is stated that buildings of up to twelve storeys are suitable for Sārvabhauma gods, those with eleven (at most) are for Rākṣasa, Gandharva and Yakṣa, those which have nine or ten (at most) are suitable for brahmins; fifthly,[9] buildings with seven storeys are suitable for crown-princes and for kings; those which have from (seven) to eleven storeys are for universal monarchs; those which have three or four storeys are suitable for merchants and śūdra and, lastly, those with five storeys are for *paṭṭabhṛt.*[10]

8. See 15.57 sq. and note *ad loc.*
9. *Pañcamasya*: the first of the series is Śiva (v. 19), the second Sārvabhauma gods (v. 22b), vv. 20-22a being an interpolation.
10. *Paṭṭabhṛt*: they are most probably the *paṭṭadhara,* one of the lowest categories of kings (see chapter 29 note 1).

[38]शतहस्तसमुत्सेधात् सप्तत्यारत्निविस्तरात् ।
नेष्यतेऽधिकमानं तु सर्वथा[39] तद्विचक्षणैः ॥ २६ ॥
क्षुद्राल्पमध्यमवरादिविमानकानां
व्यामिश्रहस्तकयुजां विपुलोच्चभेदम् ।
युक्त्या यथोदितम[40]जाद्यमरेश्वराणां
नृणां तथैव कथितं हि मया पुराणैः ॥ २७ ॥

इति मयमते वस्तुशास्त्रे भूलम्बविधानो नाम
एकादशोऽध्यायः

38. E : चतुर्हस्तसमुत्सेधं
39. C : सर्वधा
40. C : यथादित-

26 Those who are knowers of the subject never plan constructions of more than one hundred cubits in height and seventy cubits in width.

27 I have expounded the different heights and widths fitting for very small, small, medium and large buildings according to the ancients; I have expressed these dimensions in different numbers of cubits and I have indicated for whom these buildings are intended according to the rule: that is, for the lords of the immortals of whom the first is Aja, and for men.

Thus ends, in the *Mayamata*, treatise on dwelling,
the eleventh chapter: RULES FOR THE NUMBER OF STOREYS.

अथ द्वादशोऽध्यायः[1]

[गर्भविन्यासः]

तैतिलानां द्विजातीनां [2]वर्णानां हर्म्यके गृहे[3] ।
गर्भन्यासविधिः[4] सम्यक् संक्षेपाद् वक्ष्यतेऽधुना[5] ॥ १ ॥
सर्वद्रव्यैस्तु सम्पन्नं गर्भं तत् सम्पदां पदम् ।
द्रव्यहीनमसम्पन्नं गर्भं सर्वविपत्करम्[6] ॥ २ ॥
तस्मात् सर्वप्रयत्नेन गर्भं सम्यग् विनिक्षिपेत्[7] ।
गर्भश्वभ्रस्य गाम्भीर्यं स्वाधिष्ठानोन्नते[8] समम् ॥ ३ ॥
चतुरश्रसमं कुर्यात् गर्तमिष्टकयाश्मना[9] ।
आपूर्य सलिलं तस्य मूले सर्वमृदं[10] क्षिपेत् ॥ ४ ॥
निम्नगाह्रद[11] सस्याद्रिवल्मीक[12] कुलिरावटे[13] ।
[14]हलस्थलाब्धिगोशृङ्गहस्तिदन्तेषु मृत्तिका[15] ॥ ५ ॥

1. Chapter missing in F.
2. A (var) : हर्म्याणां for वर्णानां
3. E : हर्म्यगर्भगैः
4. C, D : विधिं
5. D : क्रमात्
6. E : सम्यग् विपत्करम्
7. D : परिक्षिपेत्
8. A : स्वाधिष्ठानोन्नतैः
9. D : कृत्वा गर्तमिष्टकया मनः
10. D : मृतं for मृदं
11. C : मृद- for ह्रद
12. A, B, C : पल्लिके
13. A (var) : कुलरावटे; C : कुलीरावटे
14. D : हल्लाब्धयाब्धगोश्रृङ्गं
15. A (var) : मृत्तिकाः

CHAPTER 12

THE FOUNDATION DEPOSIT[1]

1-3a In a few words, but precisely, I present the rules relating to the placing of the foundation deposit in the temples of gods and in the houses of the twice-born classes.[2] A foundation deposit with all the components (prescribed) is a source of success; an incomplete deposit or the absence of anyone component leads to failure; this is why the foundation deposit should be set in place with the utmost care and without error.

3b-5 The depth of the pit meant for the deposit is to be equal to the height of the base of the building concerned. (The pit) is square and lined with bricks and stones. After it has been filled with water[3] its bottom should

1. See *Mānasāra* (chapter 12), *Ajita* (chapter 17), *Īśānaśiva* (Kriyā. 27.72 sq.), *Śilparatna* (chapter 17); see also chapter 10 (vv.101 sq.); several rites of the foundation ceremony are similar to those of the completion ceremony (18.116 sq.). For present-day practices see Stevenson 1920 pp. 353-55 or some of the Village monographs of *Census of India 1961*. Numerous foundation deposits have been found in Southeast Asia and their study may be useful for understanding some of the prescriptions given here (see below note 3); for Cambodia see Boisselier 1966 pp. 205-10 and for Champa H. Parmentier, *Inventaire descriptif des monuments chams de l'Annam*, vol. II (1918), pp. 442-443.
2. *Dvijātīnāṃ varṇānām* is perhaps to be corrected in *dvijādīnāṃ varṇānām* ('for the brahmins and other classes') as foundation deposits for vaiśya and śūdra houses are described in this chapter (see vv. 78 sq.).
3. Similar prescription is give in chapter 9 (*salilāpūrite śvabhre mṛdādīni nyaset buddhaḥ*); this may be surprising but it is clearly indicated (infra v.112) that the foundation deposit is to be placed in water (*salile sthāpayed garbham)* and the editor of *Mānasāra* is probably wrong when he emends *jalaṃ saṃpūrya* (*Mānasāra* 12.8) in *jalaṃ saṃsṛtya* explaining that "*saṃsṛtya* in the sense of 'removing' is obviously the intended reading in the place of *saṃpūrya* which means 'to fill up with'." The following precise description of a foundation pit discovered in Champa seems to leave no doubt on the subject: ". . . The pit was not very deep (0.85 m.); its bottom was made up of a layer of three solid bricks [. . .] which were placed straight upon the natural soil, levelled rigorously. *Upon that brick layer a clayey earth coating has been spread and made up a kind of watertight bottom.* It was on that coating that the deposit was placed in a small compartment made up of four solid bricks . . ." (H. Parmentier in *Bulletin de l'Ecole Française d'Extrême-Orient*, vol. VI, 1906, p. 293).

[16]तदूर्ध्वं तस्य मध्ये तु पद्मकन्दं न्यसेत् पुनः[17] ।
पूर्वे चोत्पलकन्दं[18] च दक्षिणे कौमुदं क्षिपेत् ॥ ६ ॥
सौगन्धिं पश्चिमे विद्यात् [19]नीललोहमुदग्दिशि ।
धान्यान्यष्टौ तदूर्ध्वं तु शालिर्व्रीहिश्च कोद्रवः[20] ॥ ७ ॥
[21]कङ्गु मुद्गं च माषं च कुलत्थं[22] च तिलं तथा ।
प्रादक्षिण्येन शाल्यादीनीशानादिषु विन्यसेत्[23] ॥ ८ ॥

[फेला]

[24]तस्योपरि निधातव्यं मञ्जूषं ताम्रनिर्मितम् ।
त्रिचतुर्मात्रविस्ताराद् द्विद्व्यङ्गुलविवर्धनात्[25] ॥ ९ ॥
[26]पञ्चषड्विंशमात्रान्तं मानं द्वादश भाजने ।
[27]समोच्चं वाऽष्टषट्पञ्चभागोनं[28] वा तदुच्छ्रयम् ॥ १० ॥
एकादिद्वादशान्तानां हर्म्याणामुदितं क्रमात्[29] ।
[30]गृहीतोच्चत्रिभागैकं पादालम्बिविधानकम् ॥ ११ ॥
तत्तद्धर्म्याङ्घ्रिविष्कम्भसमं वाष्टांशहीनकम् ।
त्रिपादं वा विशालं तत् फेलायाः प्रागिवोच्छ्रयम्[31] ॥ १२ ॥
[32]त्रिवर्गमण्डपाकारं वृत्तं वा चतुरश्रकम् ।
पञ्चविंशतिकोष्ठं वा नवकोष्ठकमेव वा ॥ १३ ॥

16. A (var) : तदूर्ध्वे
17. D : पद्मकं विन्यसेद् वुधः
18. D : चोत्पलमूलं
19. A : काकलोह-; A (var), B, C, D, E : काकलोट्य-
20. D : तद्यवम् for कोद्रवः
21. D : काकमुद्गं च
22. C : कुलित्थं; D : कुलस्थं
23. D : विन्यके
24. A (var), D, E : धान्योपरि
25. C : विस्तारं द्विद्विमात्रविवर्धनात्
26. A (var), D : विस्तारं पञ्चषड्विंशदङ्गुलान्तं हि भाजने
27. D : समोच्छ्र्याष्ट-
28. A (var) : मानं for भागोनं
29. C : उदितं क्रमं; D : च ततो क्रमात्
30. E : omits 11b; D places it after v.12.
31. A (var) : प्रागिवोच्छ्रितम्
32. D : त्रिगर्भ-

be covered with every sort of earth: from a river, from a pond, from a wheat (field), from a mountain, an anthill, a crab's hole, from the ploughshare, from the horn of a bull or of a buffalo and from an elephant's tusk.

6-8 Next should be arranged on that: a root of *padma* in the middle, one of *utpala* in the east, one of *kumuda* in the south, one of *saugandhi* in the west and one of *nīlaloha* in the north.[4] The eight grains are placed above that: *śāli*, *vrībi*, *kodrava*, *kaṅku*, *mudga*, *māṣa*, *kulattha* and *tila*; the arrangement is made according to the *pradakṣiṇa* taking *śāli* in the north-east as the starting point.

The casket[5]

9-12 Over this is placed a copper casket: there are twelve possible widths for this receptacle, from three to four digits to twenty-five to twenty-six digits by successive increments of two digits.[6] Its height is equal (to its width) or less by an eighth, sixth or fifth. (These twelve sets of dimensions) are suitable for buildings of, respectively, one to twelve (storeys). (Otherwise the width of the casket) is the third of (its) height chosen according to the rules given for pillars (?).[7] (Otherwise) it is equal to the diameter of the pillar of the building concerned or to seven-eighths or three quarters of that diameter;[8] regarding the height (it is calculated) as above.

13-15a The casket is shaped like a pavilion with three levels of elevation.[9] It

4. Cf. *Suprabheda* (Kriyā. 29.24b-25a):
 उत्पलस्य च पद्मस्य नीललोहितस्य च ।
 कुमुदस्य च मूलानि विन्यसेदनुपूर्वशः ॥
5. Several terms are used to designate the foundation deposit casket:*mañjūṣa, bhājana, pātra, phelā*. For samples of similar caskets found in Southeast Asia see Stanley J.O'Connor, "Ritual Deposit Boxes in Southeast Asian Sanctuaries" (*Artibus Asiae*, Vol. 28, 1976, pp.53 sq.).
6. Thus, there are two sets of dimensions, even and uneven, as for buildings (see chapter 11 passim) or 'first bricks' (infra vv. 103-107).
7. Meaning? The half-verse 11b (missing in one manuscript and placed after v. 12 in another one) is perhaps out of place.
8. Thus the casket can be measured with the 'module' like most of the parts of the building (see 15.28-29).
9. *Trivargamaṇḍapākāra*: that is to say that the casket looks like a pavilion with base, pillars and flat roof (see 25.25).

[33]फेलोच्चार्धत्रिभागैकं कोष्ठभित्त्युच्छ्रयं भवेत् ।
[34]तद्भित्तिघनतां कुर्याद् यवैर्द्वित्रिचतुष्टयैः ॥ १४ ॥
उपपीठपदे देवाः[35] पञ्चविंशति सम्मताः[36] ।

[गर्भस्थापनम्]

श्वभ्रोर्ध्वभूतलं सर्वं गन्धैः पुष्पैश्च[37] दीपकैः ॥ १५ ॥
वासयित्वा तु पूर्वेद्युः[38] पञ्चगव्यैस्तु भाजनम् ।
प्रक्षाल्य सूत्रैरावेष्ट्य[39] शुद्धशाल्यास्तरे[40] शुभे ॥ १६ ॥
[41]स्थण्डिले चण्डितं कृत्वा मण्डूकं [42] वाऽथ तत्परम् ।
[43]विन्यस्य देवान् ब्रह्मादीन् श्वेततण्डुलधारया ॥ १७ ॥
आराध्य गन्धपुष्पाद्यैर्भुवनाधिपतिं[44] जपेत् ।
स्थपतिः कलशान् न्यस्य[45] सर्वान् वस्त्रविभूषितान् ॥ १८ ॥
सुगन्धोदकसम्पूर्णान् गन्धपुष्पसमर्चितान्[46] ।
निष्कलङ्कानसुषिरान् पञ्चपञ्चैव सूत्रितान्[47] ॥ १९ ॥
तस्य प्रदक्षिणे [48]गन्धशालिस्थण्डिलमण्डले[49] ।
आराध्य गन्धपुष्पाद्यैर्बलिं दत्त्वा यथाविधि ॥ २० ॥
भाजनाय ततः [50]पात्रं वेष्टयेच्छ्वेतवाससा [51] ।
श्वेतवस्त्रास्तरस्योर्ध्वे[52] न्यसेद् दर्भास्तरे शुचिः ॥ २१ ॥

33. D : वेळोच्चन्तु for फेलोच्चार्ध-
34. C : omits 14b.
35. D : उपपीठपदं देवान्
36. A (var) : सम्मतम्
37. A (var) : गन्धपुष्पैश्च
38. D : पूर्वेण
39. D : सूत्रनावेष्ट्य
40. A (var), C : शुभाह्ने भास्करे; D : शुद्धशालास्तले
41. D : स्थण्डिल-
42. D : चापि for वाथ
43. D : omits 17b.
44. D : भुवनाधिपतिर्
45. C : न्यस्यात्
46. D : समर्पितान्
47. A (var), E : सूत्रिका
48. D, E : शुद्ध for गन्ध-
49. A (var) : स्थण्डिलं मण्डले; D : स्थण्डिलमण्डलैः
50. C : सूत्रं for पात्रं
51. A, D : वेष्टयेच्छेतवाससा
52. C : वस्त्रान्तरस्योर्ध्वे

is circular or square and comprises twenty-five or nine compartments;[10] the height of the partitions dividing (these last) is half or one-third that of the casket; their thickness should be two, three or four barley grains.[11] If it corresponds to the *upapīṭha* diagram then twenty-five gods are honoured therein.[12]

Placing the deposit

15b-17 On the eve (of the day of ceremony), the ground around the pit should be perfumed and incensed and lamps (should be arranged there). The casket should be washed in the mixture of the five products of the cow and it should be covered by threads. Then when a *caṇḍita*—also called *maṇḍūka*—diagram[13] has been drawn on the sacrificial ground which is covered with an even coat of rice, unhusked and pure, the gods starting with Brahmā, are installed with an offering of hulled white rice.

18-19 Then the architect, in a whisper invokes, the Lord of the World,[14] having propitiated Him with offerings of flowers, perfumes . . . etc. Pitchers are arranged next, all of them covered with linen, filled with pleasantly perfumed water, surrounded by fragrant flowers and not pierced or sullied and arranged five to a line.

20-21 On the diagram drawn upon the sacrificial ground made of perfumed rice, after flowers, perfumes . . . etc. have been scattered, an offering is made to the casket in a clockwise direction and according to rule. The casket is then wrapped in white cloth and the sage places it upon white linen on a spread of *darbha* grass.

10. That is to say that it may follow the *pīṭha* (9 compartments) or the *upapīṭha* diagram (25 compartments); see 7.9.
11. *Yava*: see 5.3-4.
12. For the names of these gods see 7.25-28; they are used to locate the compartments where the components of the deposit are to be placed.
13. See 7.31.
14. Bhuvanādhipati: Śiva (see *Īśānaśiva* Mantrapāda 21.67 sq).

पीत्वा शुद्धं पयो [53]रात्रावुपोष्याधिवसेत् ततः ।
स्थपतिः शास्त्रवित् प्राज्ञः[54] सूत्रग्राह्यादिसेवितः ॥ २२ ॥
धान्यादीन्यथ[55] वस्तूनि भाजनाभ्यन्तरे न्यसेत् ।
हेमराजतशुल्बैश्च शालिव्रीहिकुलत्थकान्[56] ॥ २३ ॥
[57]त्रपुणा कङ्कु सीसेन माषो मुद्गोऽयसायसा[58] ।
कोद्रवं च तिलं भाव्यं वैकृन्तेन[59] प्रयत्नतः ॥ २४ ॥
[60]ईशादिषु न्यसेदेतान्यष्टदिक्षु यथाक्रमम् ।
जयन्ते जातिहिङ्गुल्यं हरितालं भृशे मतम् ॥ २५ ॥
[61]मनःशिला च वितथे भृङ्गराजे तु माक्षिकम्[62] ।
राजावर्तं तु सुग्रीवे शोषे गैरिकमीरितम् ॥ २६ ॥
अञ्जनं गणमुख्ये स्यादुदितौ दरदं[63] विदुः ।
मध्यमे पद्मरागं तु मरीचौ विद्रुमं[64] मतम् ॥ २७ ॥
[65]सविन्द्रे पुष्परागं तु वैडूर्यं स्याद् विवस्वति ।
[66]वज्रमिन्द्रजये विद्यादिन्द्रनीलं तु मित्रके ॥ २८ ॥
रुद्रराजे महानीलं मरकतं[67] मु महीधरे ।
[68]मुक्तापवत्से मध्यादिपूर्वेण क्रमशो[69] न्यसेत् ॥ २९ ॥

53. D : रात्रात् for रात्राव
54. D : सूत्रैः for प्राज्ञः
55. A (var) : अत्र for अथ
56. A (var) : कुलत्थकम् C : कुलित्थकम्; D : कुलुस्तकम्
57. D : त्रपुषा
58. C, E : मुद्गोयवोऽयसा; D : मुद्गोऽयसायकौ
59. B : नैक्रान्तेन; C : एवं कुर्यात्; D : सैकृतेन
60. D : ईशनाद्यष्टधान्याष्टावष्टधान्यौ समर्पिताः
61. C : मनःशिलां
62. A (var) : माषिकम्
63. D : तु रसं for दरदं
64. D : विभ्रमं
65. A (var) : सवित्रे
66. D : वज्रन्द्रिजयीचीन्द्रनीलसायन्तमित्रके ।
67. E : मारुत्यतं for मरकतं
68. E : रत्नापवत्से
69. A (var), D, E : पूर्वोक्तक्रमशो

22 Finally, after drinking pure water and fasting, the architect who knows the treatises, the sage, honoured by the *sūtragrāhin* and his other assistants, settles himself for the night.

23-25a (Next day the architect) arranges the component in the casket, starting with the grains; the *śāli,* figured in gold, the *vrīhi* in silver, the *kulattha* in copper, the *kaṅku* in tin, the *māṣa* in lead, the *mudga* in iron, the *kodrava* in iron and the *tila* in mercury;[15] the placing of the grains is to be done with care in the given order to the eight directions beginning with that of Īśa (in the north-east).[16]

25b-27a It is known that (next) cinnabar[17] is put in (the compartment of) Jayanta, in (that of) Bhṛśa orpiment, in (that of) Vitatha red arsenic, in (that of) Bhṛṅgarāja red chalk, in (that of) Sugrīva lapis lazuli, in (that of) Śoṣa hematite, in (that of) Gaṇamukhya antimony and in (that of) Uditi red copper.

27b-29 In the central (compartment) should be a ruby, in (that of) Marīci coral, in (that of) Savindra a topaz, in (that of) Vivasvant a tiger's eye; a diamond is prescribed for (the compartment of) Indrajaya, for (that of) Mitraka an *indranīla* sapphire, for (that of) Rudrarāja a *mahānīla* sapphire, for (that of) Mahīdhara an emerald, and a pearl for that of Āpavatsa; these are all to be placed in the inner (compartments of the casket) starting at the centre and proceeding towards the east, etc.

15. See 9.118-119. One may also understand that the grains are to be placed together with the metal (a Cola inscription makes mention of rice grains coated in gold and given to a temple: K.A.N. Sastri, *The Coḷas*, 1st edn., vol. I p. 530).
16. That is to say in the compartments of which positions correspond to those of Īśa, Indra . . . on the *upapīṭha* diagram (see above v. 13-15a).
17. We are given here a list of colouring substances used for mural paintings (cf. *Mānasollāsa* t.II vv. 158-64).

[70]विष्णुक्रान्ता त्रिशूला[71] श्रीः[72] सहा दूर्वा च[73] भृङ्गकम् ।
अपामार्गैकपत्राब्जमीशादिष्वौषधान्यसेत्[74] ॥ ३० ॥
चन्दनागरुकर्पूरलवङ्गैलालताफलम्[75] ।
तक्कोलेनाष्टगन्धांस्तु जयन्तादिषु विन्यसेत्[76] ॥ ३१ ॥
स्वस्तिकानि चतुर्दिक्षु हेमायस्ताम्ररूप्यकैः[77] ।
सर्वेषामपि सामान्यमेतच्चिह्नैस्तु लक्ष्यते[78] ॥ ३२ ॥

[शिवगर्भम्]

[79]कपालशूलखट्वाङ्गं परशुं वृषभं तथा ।
पिनाकं हरिणं पाशं हैमं पूर्वादिषु न्यसेत् ॥ ३३ ॥
कार्तस्वरमयं चाष्टमङ्गलं तत्र[80] पूर्ववत् ।
दर्पणं पूर्णकुम्भं च वृषभं युग्मचामरम् ॥ ३४ ॥
श्रीवत्सं स्वस्तिकं शङ्खं दीपं[81] देवाष्टमङ्गलम् ।
स्थापकस्यानुशिष्यस्तान् स्थपतिः क्रमशो[82] न्यसेत् ॥ ३५ ॥
आच्छाद्य भाजनं शुभ्रं पिधानेन[83] तु निश्चलम् ।
तमेवाराध्य गन्धाद्यैः स्नापयेत्[84] कलशोदकैः ॥ ३६ ॥
[85]विप्रस्वाध्यायघोषैश्च शङ्खभेर्यादिनिःस्वनैः ।
कल्याणजयघोषैश्च स्थपतिः स्थापकेन तु[86] ॥ ३७ ॥

70. D : विष्णुक्रान्ति; E : विष्णुक्रान्ती
71. A (var) : त्रिशूली
72. C : श्री; D : च
73. A (var) : समादूर्वा च; D : सिलाहा दूर्व-
74. A, B, E : औषधं न्यसेत्
75. D : लवङ्गैर्लालितं मलम्
76. D : जयन्ताद्यष्ट विन्यसेत्
77. D : हेमायस्ताम्ररूप्यके
78. A, B, D, E : वक्ष्यते
79. C : कपालं
80. A (var) : चात्र
81. D : दीपा
82. D : कलशान् for क्रमशो
83. A (var), C, E : श्वभ्रं परिधाने
84. A (var), C, D : स्थापयेत्
85. D : विप्रस्याश्रययोषैश्च
86. A (var), E : स्थापकाज्ञाया

30-32a In (the eight compartments corresponding to the cardinal and intermediate directions) beginning with that of Īśa, the medicinal plants are arranged: *viṣṇukrāntā, triśūlā, śrī, sahā, dūrvā, bhṛṅgaka, apāmārga* and *ekapatrābja*.[18] Then, in the (the compartments of the gods) beginning with Jayanta the eight fragrant plants are arranged: sandalwood, bdellium, camphor, clove, cardamon, *latāphala, takkola* and *inā*.[19] Lastly, *svastika,* in gold, iron, copper and silver, should be placed at the cardinal points.[20]

32b What has been given is fitting for all (gods) but each one has his specific attributes (which will now be presented).

Foundation deposit for the Śiva temple

33-35 A skull, a trident, a *khaṭvāṅga*, an axe, a bull, a bow, a gazelle and a noose, all in gold, should be placed in the main directions beginning with the east.[21] The eight auspicious objects in gold should be placed according to the same disposition: mirror, vase of plenty, bull, double fly-whisk, *śrīvatsa*, *svastika*, conch and lamp; the wise architect arranges them in order according to the direction of the *sthāpaka*.[22]

36-41a Then, the perfect and strong casket having been closed with a lid, propitiatory offerings of perfumes and other things having been made to it, the lid should be purified with waters from the pitchers. Next, whilst the brahmins whisper the Veda, whilst conches, drums and other instruments sound and cries of joy and victory are raised, the architect, accompanied by the *sthāpaka*, the five parts of his body[23] adorned with

18. Similar lists of *auṣadhi* are found in *Ajita* (16.30), *Kāmika* (I 31.49-50), *Mānasāra* 12.90-94 . . . *Bhṛṅgaka* = *bhṛṅgarāja* (*Eclipta erecta*)?
19. Same list in *Kāmika* I 31.50-51.
20. Most probably these *svastikas* are to be engraved on small sheets of metal or cut from such sheets.
21. These are common attributes of Śiva.
22. For other lists of *aṣṭamaṅgala* see *Rauravāgama* (N.R. Bhatt edition), vol. I, p. 79 note 9.
23. That is to say head, ears, neck, arms and fingers.

पुष्पकुण्डलहारादिकटकैरङ्गुलीयकैः ।
[87]पञ्चाङ्गभूषणैर्हेमनिर्मितैश्च विभूषणैः[88] ॥ ३८ ॥
हेमयज्ञोपवीतस्तु नववस्त्रोत्तरीयकः[89] ।
[90]श्वेतानुलेपनश्चैव सितपुष्पशिराः शुचिः ॥ ३९ ॥
ध्यात्वा धरातलं सर्वं दिग्द्विपेन्द्रसमन्वितम्[91] ।
ससागरं सशैलेन्द्रमनन्तस्योपरि[92] स्थितम्[93] ॥ ४० ॥
सृष्टिस्थितिलयाधारं भुवनाधिपतिं जपेत्[94] ।
ब्रह्मादीनां च देवानां देवीनां द्वारदक्षिणे ॥ ४१ ॥
स्तम्भमूले यथायोगं[95] गर्ते गर्भं निधापयेत्[96] ।
[97]होमस्तम्भे प्रतिस्तम्भे पादुकाच्च प्रतेरधः[98] ॥ ४२ ॥
तस्मादत्युन्नतं निम्नं गर्भं[99] सम्पद्विनाशकृत्[100] ।
[101]चतुरश्रीकृता सारवृक्षपाषाणनिर्मिता[102] ॥ ४३ ॥
पात्रद्विगुणविस्तारा पञ्चाङ्गुलघनान्विता[103] ।
प्रतिमाफलका या सा[104] स्थाप्या तद्भाजनोपरि ॥ ४४ ॥
तदूर्ध्वे स्थापयेत स्तम्भं[105] संश्लिष्टचतुरिष्टकम्[106] ।
[107]सरत्नौषधिभिर्युक्तं वस्त्रपुष्पादिशोभितम्[108] ॥ ४५ ॥

87. D : पञ्चाङ्गभूषणे हेमात् निर्मितैस्तु सुपूजितः
88. E : चाधिभूषितम्
89. D : नववस्त्रोत्तरीयकम्
90. C : श्वेतचन्दनसूनैश्च वस्त्री पुष्पशिराः शुचिः
91. A (var), E : दिग्विप्रेन्द्रसमायुतम्
92. C : अगं तस्योपरि
93. D : स्मृतम्
94. A (var) : जपन्
95. A (var) : तु योगे वा; C : यथायोगे; D : तथायोगे
96. D : त्रिधा भवेत्
97. E : हेमस्तम्भं
98. D : प्रतिदेशम्; E : व्रतेरधः
99. D : निम्नगर्भं
100. A (var), D : विनाशनम्
101. D : चतुरश्रकृते
102. D : निर्मिताम्
103. D : घनाञ्चिका
104. D : कार्या for या सा
105. A (var) : कुम्भं for स्तम्भं
106. E : दृष्टिका
107. D : सरत्नैपधिभुर्युक्त-; E : सर्वरत्नौषधिमुक्तं
108. D : सोऽर्पयेत्

flowers, ear-rings, necklaces, bracelets and rings, having donned the sacred thread of gold, dressed in new clothes and wearing a scarf, anointed with white (paste), head covered with white flowers, and purified, must first meditate upon the surface of the Earth in Her wholeness,[24] for it is She who supports the elephants, lords of the cardinal points, and, who, together with the ocean and the lords of the mountains, rests upon Ananta; then, in a murmur he invokes the Lord of the World, responsible for creation, preservation and destruction.

41b-43a The deposit is placed according to rule in a hole beneath a pillar to the right of the door (of the shrines) of Brahmā and other gods and goddesses; it must be under the *homastambha* and below the plinth or under the *pratistambha* and below the stereobate:[25] if it is placed too high or too low in relation (to plinth or stereobate) deposit will be source of misfortune.

43b-45 Above the casket a slab should be set, made of hard wood or stone, twice as wide as the casket, five digits thick and bearing images.[26] Above this is installed a pillar held up by four bricks,[27] ornamented with precious stones and plants and decorated with fabrics, flowers . . . etc.

24. The Earth is the main site (2.2 and 9).
25. For these elements see 14.7, 15.8 sq. and notes ad loc. cf. *Īśānaśiva* Kriyā. 27, 73-74:

 कुर्वीरन् गर्भविन्यासं सर्वे वर्णाः समृद्धये ।
 प्रतेरुपरि विप्राणामुपानोपरि भूभुजम् ॥
 विशां चाथ चतुर्थानां भूमावित्यपि केचन ॥

26. Cf. *Mānasāra* 12.122-23.
27. The pillar seems to be the *muhūrtastambha* (cf. 27.166); 'first bricks': see below vv. 102 sq.

ईशगर्भमिदं प्रोक्तमन्येषां तु प्रवक्ष्यते ।

[विष्णुगर्भम्]

विष्णुधिष्ण्ये च गर्भं स्याद्धैमं चक्रं तु मध्यमे[109] ॥ ४६ ॥
[110]शङ्खकार्मुकदण्डं च रुक्ममायसनन्दकम्[111] ।
धनुः शङ्खं[112] च वामे तु खड्गं दण्डं च[113] दक्षिणे ॥ ४७ ॥
[114]प्रमुखे वैनतेयं च स्थापयेद्धेमनिर्मितम् ।

[ब्रह्मगर्भम्]

यज्ञोपवीतमोङ्कारं स्वस्तिकाग्निं[115] च हेमजम् ॥ ४८ ॥
[116]पद्मं कमण्डलुं [117]चाक्षसूत्रदर्भाश्च ताम्रजाः ।
[118]ब्रह्मासनपदे मध्येऽम्बुरुहं[119] स्थाप्यमेव च ॥ ४९ ॥
[120]तस्मिन्मध्ये [121]तदोङ्कारं यज्ञसूत्रावृतं तु तत्[122] ।
स्वस्तिकानि चतुर्दिक्षु वामे स्थाप्यं कमण्डलु[123] ॥ ५० ॥
[124]कुशाक्षमालां वामे तु [125]पुरस्तीक्ष्णानलं क्षिपेत् ।
ब्रह्मगर्भमिदं प्रोक्तं ब्रह्मस्थाने प्रतिष्ठितम् ॥ ५१ ॥

[षण्मुखगर्भम्]

[126]स्वस्तिकं चाक्षमालां च शक्तिं चक्रं च[127] कुक्कुटम् ।
मयूरं चैव सौवर्णमयसा[128] शक्तिमध्यमे ॥ ५२ ॥
वामे च कुक्कुटं[129] दद्याद्[130] दक्षिणे च मूयरकम्[131] ।
अक्षसूत्रं पुरः[132] स्थाप्यं गर्भं षण्मुखसद्मनि[133] ॥ ५३ ॥

109. D : चक्रश्च मध्यमे
110. C : शङ्खं
111. D : खड्गहस्तमयसा तु तत्
112. A, C : शङं
113. D : दण्डखड्गं च
114. A (var), D : प्राङ्मुखे
115. A (var) : स्वस्तिकाख्यं; D, E : स्वस्तिकानि
116. A (var) : पद्मकं मण्डलं
117. D : चाक्षमाल-
118. A (var) : ब्रह्मस्थानगते; D, E : ब्रह्मस्थानपदे
119. D : अम्बुजं for अम्बुरुहं; A (var) : पुरुषं
120. A, C, D, E : तस्मात्
121. C, E : तथोङ्कारं
122. A, C, D, E : यत्
123. D : वामस्थाप्यकमण्डलु
124. D : कुशामाला च वये तु पुष्करेऽनलं क्षिपेत्।
125. A, B, E : पुरे
126. D : चतुर्दिक् स्वस्तिकञ्चाक्षमाला शक्तिश्च कुक्कुटम् ।
127. C : चक्रं शक्तिं च
128. D : स्वर्णं चायसा
129. D : कुक्कुटे
130. E : विद्यात्
131. D : मयूरकैः
132. A, B : पुरे
133. D : षण्मुखपद्मानि

46a The foundation deposit of (the temple of) Īśa having been described, those of (the shrines of) other divinities will now be given.

Deposit for Viṣṇu[28]

46b-48a The deposit for the Viṣṇu shrine comprises a discus in gold in the centre as well as a conch, a bow, a mace and a sword, (all) in gold; the bow and the conch are to the left, the sword and the mace to the right; Vainateya in gold should be placed in the front.

Deposit for Brahmā

48b-51 There is sacrificial thread, OṂ,[29] *svastika*, and an image of Fire,[30] all in gold as well as a lotus, a flask and a rosary of *darbha*, (these last) in copper. The lotus should be set down at the centre of them, at the place of Brahmā's throne and, in its centre, OṂ encircled by the sacrificial thread; the *svastika* are at the cardinal points, the flask and the rosary of *kuśa* to the left and the burning fire in front. Such is the deposit of Brahmā to be put at the place of Brahmā.

Deposit for Ṣaṇmukha

52-53 The foundation deposit for the dwelling of Ṣaṇmukha comprises *svastika*, rosary, spear, discus, cock and peacock in gold; the spear, in iron, in the middle,[31] the cock to the left,[32] the peacock to the right and the rosary in front.

28. Here starts the description of deposits suitable for the chapels of the attendant deities (*parivāra*) of Śiva (cf. 23.35 sq.).
29. Oṃ is probably engraved on a metal sheet.
30. Fire is not a normal attribute of Brahmā; however it is a part of sacrifice of which the utensils are amongst the Brahmā's attributes (see Banerjea, 1956, p. 516). But the disposition given afterward according to which the Fire is in front of the lotus, Brahmā's seat on which is placed OṂ who is Brahmā itself, seems to imply that deposit components are chosen and arranged in order to obtain a symbolical representation of the classical image of Brahmā seated in front of the fire (cf. images of Kalyāṇasundaramūrti of Śiva).
31. *Śaktimadhyame* in place of *śaktiṃ madhyame* for the sake of metre.

अम्बुजं चाङ्कुशं[134] पाशं सिंहं सवितृधामके[135] ।
[136]वज्रेभं नन्दकं चक्रं[137] चामरं धाम्नि वज्रिणः ॥ ५४ ॥
[138]जाम्बूनदमयं मेषं शक्तिं पावकधामनि ।
अयसा महिषं पाशं हेमजं यमधामनि ॥ ५५ ॥
[139]अयसा नन्दकं गर्भं निर्ऋतेस्तु विमानके ।
[140]वरुणे मकरं पाशं लोहजं हेमजं[141] तथा ॥ ५६ ॥
[142]वायोः कृष्णमृगं हैमं व्यालं तारापतेः क्षिपेत् ।
नरवाहे नरः प्रोक्तो मकरो मदनालये ॥ ५७ ॥
टङ्कं दन्ताक्षमाला च[143] विघ्नेशावासगर्भके[144] ।
ओङ्कारं वक्रदण्डं[145] च सौवर्णं चार्यकस्य[146] तु ॥ ५८ ॥
अश्वत्थं करकं सिंहं[147] छत्रं[148] स्वर्णे कारयेत्[149] ।
अश्वत्थः पुरतः स्थाप्यश्छत्रं[150] तस्योपरि स्थितम् ॥ ५९ ॥
[151]कुण्डिकापरभागे तु केसरी[152] दक्षिणे भवेत्[153] ।
सौगते धामके गर्भं श्रीवत्साशोकसिंहकम् ॥ ६० ॥

134. D : वाङ्कुशं
135. D : सिंहा सावित्रिधामनि; E : सिंहवक्त्रधामके
136. C : वज्रेभिन्नदकं
137. A (var), C, E : चित्रं
138. C : स्वर्णपत्रा च मे प्रक्तं श्रुत्वा पावकधामनि
139. D : अयसानान्तु खङ्गञ्च निर्ऋतिस्तु विमानकम् ।
140. D : वरुणं
141. A (var) : लोहितं हेमजं; E : लोहं हेममयं
142. D : omit v. 57.
143. C : दन्ताक्षमानाश्च
144. D : विघ्नेशं सा सगर्भकम्
145. D, E : वज्रदण्डं
146. D : च जयस्य तु
147. D : अश्वत्थकमण्डलौ
148. A (var) D : चक्रं
149. D : योजयेत्
150. D : चक्रं
151. C : कुण्डिकां
152. A (var) : केसरीं
153. A (var) : न्यसेत्

Deposits for other Attendants

54-58 (The foundation deposit) for the shrine of Savitṛ (comprises) a lotus, an elephant goad, a noose and a lion.[33] For the temple of Vajrin it is a thunderbolt (*vajra*), an elephant, a discus and a fly-whisk. That for the shrine of Pāvaka comprises a ram in Jambu gold and a spear; that of Yama, a water buffalo in iron and noose in gold; the deposit for the shrine of Nirṛti comprises a sword in iron; that of Varuṇa a *makara* in copper and a noose in gold; a black gazelle in gold should be placed for Vāyu and a *vyāla* for the consort of Tārā.[34] The image of a man is prescribed for the temple of Naravāhā (Kubera) and that of a *makara* for the shrine of Madana. For the dwelling of Vighneśa the deposit comprises an axe and an ivory rosary; for Āryaka there should be OṂ and a crooked stick in gold.[35]

59-60 For foundation deposit of the shrine of Sugata are to be made in gold an *aśvattha*, a vase, a lion and an umbrella; the *aśvattha* should be in front, the umbrella above it, the vase to the left and the lion to the right.[36]

32. The cock is always in the *left* hand of Skanda (cf. T.A. Gopinatha Rao, Vol. II/1, p. 429).
33. Savitṛ designates here Sūrya (not the site deity also called Savindra, cf. 7.38); however elephant goad, lion and noose are not amongst his normal attributes.
34. That is to say Bṛhaspati, master of the zenith.
35. Āryaka is Śāstā (Tam.: Aiyanār); cf. M. Adiceam, *Contribution à l'étude d'AiyaNār-Śāstā,* Pondichéry 1967. *Vakradaṇḍa* (Tam. *ceṇṭu)*: cf. F. L'Hernault, *L'iconographie de Subrahmaṇya au Tamilnad,* Pondichéry 1978, pp.181-84.
36. Sugata is the Buddha; *aśvattha* is the Bodhi-tree, *karaka* vase is used by wandering ascetics, lion is a reminiscence of the surname 'Lion of the Śākya' and umbrella of the Buddha's royal character.

कमण्डल्वक्षमाला च शिखिपिञ्छं तु हेमजम् ।
[154]त्रिच्छत्रं करकं तालवृन्तं[155] रुक्ममयं भवेत् ॥ ६१ ॥
[156]वृक्षस्तु पुरतः स्थाप्यश्छत्रं[157] तस्योपरि स्थितम् ।
पिञ्छं दक्षिणभागेऽक्षमाला वामे तु कुण्डिका ॥ ६२ ॥
[158]श्रीरूपं मध्यमे स्थाप्यं केसरीं[159] तत्र विन्यसेत् ।
[160]अपरे करकं तालवृन्तं गर्भो[161] जिनालये ॥ ६३ ॥
[162]शुकं चक्रं च हैमं तु सिंहं शङ्खं च राजतम् ।
मृगं ताम्रमयं चैव कृष्णलोहेन नन्दकम् ॥ ६४ ॥
एवं दुर्गाविमाने तु गर्भं[163] कुर्याद् विचक्षणः ।
[164]खट्वाङ्गं नन्दकं शक्तिं क्षेत्रपालस्य हेमजम् ॥ ६५ ॥
[165]पद्मं लक्ष्म्याः सरस्वत्या ओङ्कारं च त्रिवर्णकम् ।
[166]ध्वाङ्क्षकेतूत्पलं हैमं ज्येष्ठाकोष्ठस्य गर्भके ॥ ६६ ॥
कपालशूलघण्टाभिः[167] प्रेतान् कालीगृहे[168] न्यसेत् ।
हंसोक्षशिखिताक्ष्यांश्च सिंहेभप्रेतरूपकान्[169] ॥ ६७ ॥
[170]जाम्बूनदमयान् मातृकोष्ठकेषु निधापयेत्[171] ।
पद्माक्षसूत्रकं दीपं[172] रोहिणीगृहगर्भके[173] ॥ ६८ ॥

154. D : त्रिचित्र
155. E : ताल वृत्तं
156. A (var), C : वृषस्तु
157. D : स्थाप्य छत्रं
158. A (var) : श्रीपुरं
159. C : केसरी; D : केसरं
160. D : अपरे वायसं तालवृन्तं; E : अपरे तु महातालवृन्तं
161. C : गर्भं
162. D : शिबिकाञ्छत्रहेमं च मृगेन्द्रं च राजतम् ।
163. E : विमानेन गर्भं
164. D : omit 65b.
165. D : पद्मलाक्षं गृहं स्थाप्य ओंङ्कारं च त्रिवर्णकम् ।
166. E : ध्वाङक्षतत्रबलं हेमे
167. D : कपालशूलीकण्ठा च
168. E : प्रेतकालिगृहं
169. C : रूपकाः
170. D : जाम्बूनदयोमत्रि कोष्ठके च विधीयते
171. A (var), E : -तु विधीयते
172. A (var) : दीप्यं; D : दीप-
173. D : गर्भकम्

61-63 The deposit for the shrine of Jina comprises a *śrīvatsa*, an *aśoka*, a lion, a flask, a rosary, a peacock's tail in gold, a triple umbrella, a *karaka* vase and a gold fan; the tree must be in front and the umbrella above (it), the tail (of the peacock) to the right and the rosary together with the flask to the left; in the centre is the *śrīrūpa* and the lion; the *karaka* vase and the fan are to the left.[37]

64-66 The sage must arrange the deposit for the shrine of Durgā in the following way: a parrot and discus in gold, a lion and a conch in silver, a gazelle in copper and an iron sword. For Kṣetrapāla there are *khaṭvāṅga*, sword, and spear in gold. For Lakṣmī there should be a *padma*, for Sarasvatī OṂ in three letters. In the deposit for the shrine of Jyeṣṭhā there should be a standard figuring a crow, and an *utpala* in gold.

67-69 In the Kālī temple should be placed *preta* as well as a skull, a trident and a bell. In the shrine of the Mothers there should be gold images of *haṃsa*, bull, peacock, Garuḍa, lion, elephant and *preta*.[38] The deposit for the shrine of Rohiṇī comprises a lotus rosary and a lamp[39] and it is known that in the shrine of Pārvatī there must be a mirror and a rosary and in that of Mohinī, a lotus rosary and a vase of plenty.

37. *Śāla* tree would have been more appropriate; *śrīvatsa* (or *śrīrūpa*) is to be figured on Jina's chest (see e.g. *Bṛhat Saṃhitā* 57-45).
38. These mounts are those of the Seven Mothers (see below 36.211 sq.).
39. This may concern with Rohiṇī or the Seven Rohiṇī (see 36.194b-195 and note *ad loc.*).

दर्पणं चाक्षमालां च पार्वतीभवने विदुः[174] ।
पद्माक्षसूत्रकं पूर्णकुम्भं मोहिनिधामनि ॥ ६९ ॥
[175]छत्रध्वजपताकाश्च[176] सचिह्नैः सह वाहनैः[177] ।
अनुक्तानां च देवानां देवीनां गर्भमिष्यते ॥ ७० ॥

[मानुषहर्म्यगर्भकम्]

द्विजातीनां तु वर्णानां[178] जातिगर्भो विधीयते[179] ।
करकं दन्तकाष्ठं[180] च शुल्बं हेममयं भवेत् ॥ ७१ ॥
यज्ञोपवीतं यज्ञाग्निं[181] यज्ञभाण्डं च[182] राजतम् ।
यज्ञोपवीतमध्यस्थं यज्ञभाण्डं च दक्षिणे[183] ॥ ७२ ॥
वामे तु करकं काष्ठमनलं पुरतो भवेत् ।
विप्रगर्भमिदं प्रोक्तं स्वस्तिकानि चतुर्दिशि[184] ॥ ७३ ॥
मध्ये हेममयं चक्रं[185] वामे शङ्खं च राजतम् ।
कार्मुकं ताम्रजं वामे दण्डो रुक्मेण[186] दक्षिणे ॥ ७४ ॥
खड्गं चायसमेव[187] स्याच्चतुर्नागाश्चतुर्दिशि ।
[188]हैममायसकं ताम्रं राजतं क्रमशो न्यसेत् ॥ ७५ ॥
[189]मध्ये श्रीरूपकं हैमं स्वस्तिकानि चतुर्दिशि ।
[190]छत्रध्वजपताकाश्च दण्डं वै शासनात्मकम् [191] ॥ ७६ ॥

174. D : गृहगर्भकम् for भवने विदुः
175. A, C : चित्र- for छत्र-
176. C, D : पताकाश्च
177. D : स्वस्वचिह्नैः स्वचिह्नयेत्
178. E : ज्ञातीनां for वर्णानां
179. D : जातिगर्भविमिश्रितम्
180. A, C, E : दण्डकाष्ठं
181. E : यज्ञानि; D : यज्ञाङ्गं
182. A (var), D, E : यज्ञभाण्डानि
183. A (var), E : प्रदक्षिणे; D : विराजितम् for दक्षिणे
184. D : चतुर्दश
185. D : छत्रं for चक्रं
186. D : कांस्येन for रुक्मेण
187. C, D : एवं for एव
188. D : हेममायमयं
189. D : omits 76a.
190. E : चित्रध्वज- for छत्रध्वज-
191. C, D : दण्डं शासनमात्मकम्

70 For gods and goddesses who have not been mentioned, the foundation deposit is to comprise umbrellas, standards and emblems with the attributes of the gods and images of their mounts.

Specific deposits for human dwellings

71-73 Now the specific foundation deposits are given for twice-born classes.[40] The deposit fitting for brahmins comprises a *karaka* vase and a tooth-stick, one in copper the other in gold, as well as a sacred thread, the sacrificial fire and the utensils for the sacrifice, all in silver. The thread is in the centre, the utensils to the right and the vase to the left; the tooth-stick and the fire are in front and there are *svastika* at the cardinal points.

74-77 (The deposit proper to kṣatriya)[41] should comprise a gold discus in the centre, to the left a silver conch and copper bow, to the right a gold mace and iron sword; four elephants are in the four directions in, respectively, gold, iron, copper and silver; there is (as well) in the middle a gold *śrīrūpa* and regalia at the four cardinal points: umbrella, standard, emblem and sceptre.[42] This deposit should be put in place at the royal gate (if for a king); for other people it should be placed where

40. See above note 2.
41. Kṣatriya are not mentioned; however the composition of the deposit as well as the position of its description in the text leave no doubt on the subject.
42. *Daṇḍam . . . śāsanātmakam*: "a stick of which the essence is command".

[192]राजद्वारे भवेद् गर्भमन्येषां तु यथार्हकम् ।
वार्ष्णेयकानां गर्भं चेद् विजयद्वारदक्षिणे ॥ ७७ ॥
अयसा हलजिह्वां च शङ्खं[193] ताम्रकुलीरकम् ।
[194]पञ्चायुधं सीसमाषं हयं[195] वृषगजौ हरिम् ॥ ७८ ॥
[196]अर्काग्निवरुणेन्दूनां स्थाने सम्यङ् निवेशयेत्[197] ।
चत्वारो धेनुकाः श्वेतनिर्मिताश्च[198] चतुर्दिशि ॥ ७९ ॥
[199]गोपुङ्गवं[200] च पुरतो वैश्यानां प्रविधीयते ।
[201]बीजपात्रं हलं हैमं[202] ताम्रजं युगमिष्यते ॥ ८० ॥
रजतेन पशुं[203] विद्याच्चतुर्दिक्षु विनिक्षिपेत् ।
मध्ये गोपुङ्गवं चैव तन्निरीक्ष्य युगं पुनः ॥ ८१ ॥
[204]हलं दक्षिणभागे तु वामांशे बीजपात्रकम् ।
[205]बीजं हिरण्मयं शूद्रगर्भं वैश्ये च सम्मतम् ॥ ८२ ॥
[206]गृहाणां गृहगर्भं च जातिगर्भं विमिश्रितम्[207] ।
अनेकभूमियुक्तानि यानि वासगृहाणि च ॥ ८३ ॥
पुष्पदन्ते च भल्लाटे महेन्द्रे च गृहक्षते ।
दक्षिणे नेत्रभित्तौ तु सौम्यादौ तु चतुर्गृहे ॥ ८४ ॥
[208]द्वारप्रदक्षिणे स्तम्भे योगे वाऽपि विधीयते ।
[209]स्थाली तदुपधानं च दार्विकं[210] तण्डुलं खजम् ॥ ८५ ॥

192. D : omit 77a.
193. A : शङ्कं
194. C : पञ्चायुधं सोममाषहयो वृषगजो हरिः
195. A : हयौ
196. C : अर्कार्किवरुणेन्दूनां; D : अर्को वरुणेन्द्राणां
197. D : निधापयेत्
198. A (var) : चैव निर्मिताश्च; D : चैते निर्मिताश्च
199. D : omit 80a.
200. A (var) : गोपुङ्गवीं
201. A (var) : द्विजपत्रं; E : ध्वजपात्रं
202. A (var) et D : स्वर्णं for हेमं
203. A (var), C, D : पशून्
204. C : हल-
205. C : बीजं हिरण्मयं गर्भं वैश्ये शूद्रे च सम्मतम्
206. D : omit 83-84.
207. A (var) : विनिःसृतम्
208. A : द्वारि
209. E : मालिकादूपधानञ्च
210. B : वार्षिकं

suitable. If it is a deposit pertaining to pārṣṇeyaka it must be to the right (or to the south) of the Vijaya gate.[43]

78-80a For vaiśya a ploughshare is prescribed, a conch in iron, a small copper crab, the five weapons (of Viṣṇu)[44] and a bean in lead; there is a horse, an elephant, a bull and a lion on the squares of Arka, Agni, Varuṇa and Indu, respectively;[45] four silver cows are disposed at the cardinal points and a bull in the east.

80b-82 The deposit proper to śūdra is equally suitable for vaiśya; it comprises a seed bowl, a gold plough and a copper yoke but it should be known that there is a silver cow at each of the cardinal points and, in the centre, a bull in front of which is the yoke. The plough is to the right, the seed bowl to the left and the seeds are in gold.

83-84 The foundation deposit proper to (each) of the main buildings of a house and that proper to the caste must be mixed.[46] The dwellings with several storeys . . . (?).[47] In the four main buildings (of a house) starting with that in the north, the foundation deposit must be on the squares of Puṣpadanta, Bhallāṭaka, Mahendra and Gṛhakṣata, under the wall of the facade to the right of the door.[48]

85-87 In a *mahānasa* (i.e. *annālaya*) an earthenware vase with its lid should be put, either beneath the pillar to the right of the door or under the right jamb, and with it *dārvika,* rice, a plane, a sieve, a tooth-stick and an iron image of the fire. The deposit of the building located in the south

43. Pārṣṇeya are a category of kings (see 29.2b). Vijaya gate may be a 'Victory gate' or a gateway of *vijaya* type as described in 30.114.
44. Cf. 36.14 and 30b.
45. That is to say that they are to be to east, southeast, west and north.
46. Thus, only one deposit (i.e. the embryo) is necessary.
47. The half-verse 83b seems out of place.
48. Puṣpadanta, Bhallāṭa, Mahendra and Gṛhakṣata squares correspond to the door of a *catuḥśāla.* For *annālaya, dhānyālaya, dhanālaya* and *sukhālaya* of which foundation deposits are described afterward see 27.18 sq.

[211]गलक्यं दन्तकाष्ठाग्निं कृष्णं लोहं महानसे ।
[212]दक्षिणे भवने गर्भः कुम्भः शाल्युदपूरितः[213] ॥ ८६ ॥
धनसद्मनि गर्भस्तु सार्गलं[214] कुञ्चिकं[215] भवेत् ।
[216]पर्यङ्कदीपशयनं गर्भं विद्यात् सुखालये ॥ ८७ ॥
[217]येन यत् कर्म निष्पाद्यं तेन तद्गृहगर्भकम् ।
यानि यस्य स्वचिह्नानि तानि तस्य[218] निधापयेत् ॥ ८८ ॥
सभाप्रपामण्डपेषु कर्णपादे[219] प्रदक्षिणे ।
[220]द्वितीयस्तम्भके द्वारदक्षिणाङ्घ्रौ तु वा न्यसेत्[221] ॥ ८९ ॥
अयोमयगजो गर्भः कृष्णलोहेन कोद्रवः ।
लक्ष्मीं सरस्वतीं हेमां[222] पात्रमध्ये तु विन्यसेत् ॥ ९० ॥
गर्भो नाट्यसभायां च[223] प्रक्षिपेत् कुटिकामुखे[224] ।
[225]मण्डितस्तम्भमूले वाऽप्युभयोरपि चेष्यते ॥ ९१ ॥
[226]आतोद्यानि च सर्वाणि सर्वलोहमयानि च ।
श्रीवत्सं पङ्कजं पूर्णकुम्भं हेमजमिष्यते[227] ॥ ९२ ॥
[228]हेमगर्भसभागर्भो द्वारस्तम्भे विधीयते ।
[229]पूर्वोक्ते कर्णपादे वा गर्भस्थानं तु तस्य वै ॥ ९३ ॥
[230]तुलाभाराभिषेकार्थं मण्डपे वाऽथ तद् भवेत् ।
पाषण्ड्याश्रमिणां वासे[231] तत्तच्चिह्नं तु गर्भकम् ॥ ९४ ॥

211. D : गलक्यदन्तकाष्ठग्रितूलहं महासने
212. D : omits 83b.
213. C : शाल्यादिपूरितः
214. A (var) : गर्भं तु स्याद् गलं
215. A, C : कुञ्चितं
216. D : पर्यङ्कं पुष्पशयनं गर्भं कुर्यात् सुखालये
217. D : यानि यो निष्पाद्यं तत्तत् गेहे तु गर्भकम्
218. D : तस्य धाम्नि for तानि तस्य
219. A (var), C : कर्मपादे; D : कण्ठपादे
220. D : omits 89b-90a.
221. A (var) : विन्यसेत्
222. C : हेम-
223. A (var), D : चेत् for च
224. D : कुट्टिकामुखे
225. D : मण्डितस्तम्भकुले बाह्ययोर्विशेषिते
226. D : आतौद्यानि; E : अतोद्यानि
227. D : पूर्णं हेमकुम्भं जनिष्यते
228. D, E : हिरण्य for हेम-
229. A (var), C : पूर्वोक्ति कर्णपार्श्व
230. D : तुलाभाराभिषेक वा मण्टपे वा विधीयते
231. D : पाषण्ड्यश्रमनावासे

(i.e. *dhānyālaya*) is a ladle filled with cooked rice. The deposit of the *dhanasadman* (i.e. *dhanālaya*) must be a key and a bolt. The *sukhālaya* deposit is to comprise a bed, a lamp and a seat.

88 It is the activity performed in a building which is to determine the deposit peculiar to that building and it is objects characteristic of that activity which are to be put here.

89-90 In a hall, in a light building and in a pavilion,[49] the foundation deposit is placed beneath the corner to the south or beneath the second pillar to the right of the door or beneath the right door jamb.[50] It comprises an iron elephant and a grain of *kodrava*; in the centre of the container gold images of Lakṣmī and Sarasvatī should be placed.

91-92a The foundation deposit for a theatre (*raṅga*) is placed beneath the apse or at the base of the *maṇḍitastambha* (?)[51] or in both places; it consists of all kinds of instruments in every type of metal.

92b-95a The deposit for the hall intended for the *hemagarbha* ceremony should comprise a *śrīvatsa*, a lotus and a vase of plenty in gold; it must be inserted beneath the door jamb or beneath the corner pillar, as given above, and this goes as well for the *tulābhāra* pavilion.[52] The deposit appropriate for dwellings of members of a heterodox sect is constituted of the attributes of that sect and, for all inferior castes, it is

49. *Sabhāprapāmaṇḍapeṣu*: see chapter 2 note 6.
50. Cf. 25.192.
51. *Kuṭika*: 'curved', hence 'apse' (?). *Maṇḍitastambha*: 'decorated pillar' or 'pillar with an abacus' (*maṇḍī*)? cf. Dagens 1984 pp. 58-59.
52. Buildings for golden embryo and ritual weighing ceremonies are parts of the king's palace (for detailed descriptions see 29.205 sq.)

जात्यन्तराणां सर्वेषां तत्तच्चिह्नं प्रयोजयेत् ।
गृहिणी गर्भिणी कर्तुर्यदि[232] गर्भं न निक्षिपेत् ॥ ९५ ॥
रत्नानि धातवश्चैव [233]स्वल्पविस्तारभाजने ।
[234]तद्दैवस्थानभावज्ञैर्न्यस्तव्यानीह तानि वै ॥ ९६ ॥
द्वारप्रदक्षिणे स्थाने स्वामिस्थानस्य[235] दक्षिणे ।
अभ्यन्तरमुखं गर्भं[236] वस्तुमध्यं बहिर्मुखम् ॥ ९७ ॥

[गर्भमन्त्रः]

[237]इदं मन्त्रं समुच्चार्य प्राङ्मुखो वाऽप्युदङ्मुखः[238] ।
पूर्वोक्तविधिना सम्यक् स्थापयेत् स्थपतिः क्रमात् ॥ ९८ ॥

अयं मन्त्रः —"स्वरदेवताभ्यो[239] मन्त्रेभ्यः स्वाहा । सर्वरत्नाधिपतये स्वाहा[240] । उत्तमप्रजापतये[241] सत्यवादिने नमः । श्रियै नमः । सरस्वत्यै नमः[242] । वैवस्वताय नमः । वज्रपाणये नमः[243] । अभिनवसर्वविघ्नप्रशमनाय नमः । नमो वह्नये स्वाहा ॥"

[वाप्यादिगर्भः]

वापीकूपतटाके तु[244] दीर्घिकासेतुबन्धने ।
[245]मत्स्यमण्डूककुलिरं[246] सर्पं वै शिंशुमारकम् ॥ ९९ ॥
हेमजं तदुदग्भागे पूर्वायां दिशि वाथवा ।
पुरुषाञ्जलिमात्रे तु श्वभ्रे पात्रं[247] निधापयेत् ॥ १०० ॥

232. D : भर्तुः यदि
233. स्वल्व- for स्वल्प-
234. A (var) : तद्देवस्थानभावज्ञैर्न्यस्तानि तानि विधास्यताम्
235. D : स्तम्भे स्वामिनायस्य
236. D : गर्भ-
237. E : इमं
238. D : पुनरुन्मुखम्
239. D : स्वरदेवतेभ्यो; E : स्वरदैवतेभ्यो
240. D : सर्वरक्षाधिपतये स्वाहा
241. D : ओन्नमः प्रजापत्ये
242. D : omits Sarasvatī invocation.
243. E : यज्ञपाणये नमः
244. D : तटाकेषु
245. D : तस्य for मत्स्य-
246. C : सुषिरं for कुलिरं
247. D : पात्रे

that by which each is characterized which makes up the foundation deposit.

95b If the wife of the master of the house is pregnant (*garbhiṇī*) the foundation deposit (*garbha*) should not be laid in place.[53]

96-97 Precious stones and other elements must be arranged in a smaller container by those who are well-acquainted with the position of the gods (in diagrams). If the deposit is to the right of the door, or of the bedroom of the house-owner, it must face inwards; if in the centre it must be orientated towards the exterior.[54]

Formula for foundation ceremony

98 The architect must install (the deposit) correctly according to the rules given above and after pronouncing the following formula, facing east or north. Here is the formula:

"Glory to the formulae and to the deities which are their letters! Glory to the Lord of all Jewels![55] Homage to supreme Prajāpati giver of all truth! Homage to Śrī! Homage to Sarasvatī! Homage to Vaivasvata! Homage to Vajrapāṇi! Homage to the eternally youthful Destroyer of all obstacles! Glory and Homage to Vahni!"

Deposits for wells . . . etc.

99-100 In the case of a reservoir, well, tank, pond or bridge there should be disposed, to the north or to the east, in a hole the size of two cupped hands, a bowl and a fish as well as a frog, a crab, a snake, and a *makara* in gold.[56]

53. As the foundation deposit cannot be dispensed with, construction of a house is not probably to start as long as the housewife is pregnant.

54. Meaning is not clear. The *Mānasāra* (12.215) uses a similar expression to distinguish house foundation deposits from the village ones (गृहगर्भमन्तर्मुखं स्याद्ग्रामगर्भं बहिर्मुखम्) ।.

55. Sarvaratnādhipati is Varuṇa for the Ocean is *sarvaratna*.

56. In Kathiawar, a tortoise, frog or fish is thrown alive in a well once digging-out is over (Stevenson 1920 p. 360). In Angkor tortoise shaped stone caskets have been found inside bridges or dams.

[प्रथमेष्टका]

सुमुहूर्ते सुलग्ने च होराकरणसंयुते ।
रात्रौ गर्भमहन्येव स्थापयेच्चतुरिष्टकम्[248] ॥ १०१ ॥
[249]यद्यत् स्थानं तु गर्भस्य तत्रस्था प्रथमेष्टका ।
मृत्कन्दधान्यसल्लोहधातुरत्नौषधैः सह[250] ॥ १०२ ॥
गन्धद्रव्यैश्च[251] बीजैश्च विधेया प्रथमेष्टका ।
शैले शिलामयी[252] प्रोक्ता चैष्टके चेष्टकाः शुभाः[253] ॥ १०३ ॥
गर्भभाजनविस्तारा विस्तारद्विगुणायता ।
[254]विपुलार्धघना सर्वहर्म्यके चतुरिष्टका[255] ॥ १०४ ॥
अष्टौ द्वादश वा ग्राह्या मध्यमे तु महत्तरे ।
[256]ऋजुदीर्घाङ्गुलिन्यासा समसंख्या हि पुंस्त्वभाक् ॥ १०५ ॥
[257]स्त्रीत्वभागोजसंख्या सा वक्ररेखं नपुंसकम् ।
[258]सुस्निग्धाः समदग्धाश्च सुस्वनास्ताः[259] सुशोभनाः ॥ १०६ ॥
पुंस्त्रीनपुंसके हर्म्ये योजयेत्[260] ता यथाक्रमम् ।
यथा जाता पुरा तत्र स्थापनीया तथा भवेत् ॥ १०७ ॥
शिला दोषविनिर्मुक्ता बिन्दुरेखादिवर्जिता ।
[261]आदावेव तु कर्तव्या झषाले[262] प्रथमेष्टका ॥ १०८ ॥
[263]निखाताङ्घ्रौ विमाने तु न्यस्तव्या गर्भमूर्धनि ।
[264]तत्पूर्वदक्षिणे पूर्वं त्रिकोणेषु प्रदक्षिणम्[265] ॥ १०९ ॥

248. A (var), C : इष्टकाः
249. E : यत्र for यद्यत्
250. A (var), E : औषधान्विता; D : औषधानि च
251. D : द्रव्यश्च
252. D, E : शिलमय-
253. C : चेष्टका शुभा
254. C : विपुलार्ध्वघना
255. D : चतुरिष्टका सर्वहर्म्यके
256. D : ऋज्वं for ऋजु
257. C : स्त्रीत्वभागेकसङ्ख्या
258. D : omits 106b-107a.
259. A (var) : सुस्वरास्ताः
260. C : भाजयेत्
261. D : आदाये च
262. D : तुषकैर्
263. E : निखातांशौ
264. D : तत् पूर्व च चतुष्कण इष्टका च प्रदक्षिणैः
265. C : प्रदक्षिणे

The first bricks

101-104a The foundation deposit should be laid in place in the evening[57] at a favourable moment, during an auspicious conjunction, at the time and part of the day appropriate, and the four first bricks during the day. In every place where there is a foundation deposit there must be four first bricks.[58] These have to be put in place with earths, roots, grains, (grains figured in) metals, colouring (substances), gems, medicinal plants, fragrant plants and specific elements.[59] In a stone building (the first bricks) are to be stones whilst bricks are suitable for a brick building.[60] Each one should be as wide as the foundation deposit casket, twice as long as wide and half as thick as wide.[61]

104b-108a No matter what the building, there are at least four first bricks but if it is medium or large there must be eight or twelve. A male (brick) has rectilinear sides the length of which is an odd number of digits and, in the care of a female brick, this number is even; a neuter brick has curved sides. These bricks must be pleasant to the touch and well baked; they must give off a pleasing sound and be of attractive appearance.[62] They should be used in male, female and neuter buildings respectively and should, in the care of a restoration, be of the same nature as those that were previously there.[63] The first stones must be flawless, without rough patches and without grooves.

108b-110 To start with, the first of the four bricks should be placed beneath the *jhaṣāla(-stambha)* but in a temple (*vimāna*) it should be placed

57. According to v.112 what is done in the evening is the placing of components (earths, roots and grains) at the bottom of the foundation pit.
58. *Prathameṣṭakā*: (see *Śilparatna* (12.7 sq.), *Īśānaśiva* (vol. III 259-60), *Ajita* (chapter 10). ..; *mūrdhneṣṭakā* ('crowning bricks') are very similar to 'first bricks' (see 18.116 sq.).
59. *Bija* must be the components specific to the god or to the caste or to the building.
60. See 18.120-121 where prescriptions are also given for 'mingled' buildings made-up of more than two kinds of material.
61. That is to say that such a brick measures from three to twenty-six digits (*supra* vv. 9-10) while ordinary bricks are only from four to eight digit wide (15.118). When describing the foundation deposit found in Champa and mentioned above (note 3), H. Parmentier had noticed that the deposit bricks were bigger than those used to build the temple itself.
62. For brickmaking see 15.114-20.
63. For the 'gender' of buildings see 20.30-34.

[266]देवादीनां द्विजातीनां स्थापयेत् स्थपतिः क्रमात् ।
केचिच्छ्वभ्रस्य गम्भीरे पञ्चद्व्यंशावसानके ॥ ११० ॥
इष्टकादिचिते खाते वदन्ति[267] प्रथमेष्टकाम् ।
[268]पूर्ववद् वरवेषाढ्यो युक्त्या तत्र निधापयेत् ॥ १११ ॥
रूपाण्यप्यौषधानि[269] द्युतिमणि[270] कनकाद्यष्टलोहानि धातून्
पात्रे न्यस्याञ्जनादीन् शुभयुतदिनपक्षर्क्षहोरामुहूर्ते[271] ।
मृत्कन्दान्यष्टधान्यानि च निशि मतिमान् श्वभ्रमूले[272] निधाय
क्षिप्त्वा पात्राय युक्त्या बलिमथ सलिले स्थापयेद् गर्भमादौ ॥ ११२ ॥
अमरनरविमानद्वारयोगाङ्घ्रिमूले[273]
विधिवदविकलाङ्गं गर्भमादौ[274] निधाय[275]
[276]तदुपरि विधिनास्मिन् योगमङ्घ्रिं च पूर्वं
[277]सकलविभवयुक्तं स्थापयेद् गर्भमूर्ध्नि ॥ ११३ ॥
पञ्चपञ्चकलशोदकपूतौ[278] श्वेतचन्दननवाम्बरयुक्तौ ।
सर्वमङ्गलविचित्रतरौ तौ[279] स्थापयेत् स्थपतिरङ्घ्रिकयोगौ ॥ ११४ ॥

इति मयमते वस्तुशास्त्रे गर्भविन्यासो नाम
द्वादशोऽध्यायः

266. D : देवातानां
267. D : वृतन्त-
268. D : पूर्वद्वारवेषाढ्यौ
269. A (var) : रूपाण्येवौषधानि; D : रूपाण्यप्यष्टधानि
270. C : नवमणि- for- द्युतिमणि-
271. D : दिनवारे पक्षहोरामुहूर्ते
272. E : श्वभ्रपत्रि
273. C : द्वारयोर्गेहमूले
274. A (var), C : रत्नमादौ
275. C : विकल
276. C : तदुपरि विधीता द्वारमङ्घ्रिञ्च पूर्वं
277. D : विधाय-
278. D : पूरितौ; E : पूर्णौ
279. D : विचित्रकौ च तौ

beneath the *nikhātāṅghri* and on top of the foundation deposit.[64] For gods and brahmins the architect is to install the first brick to the south-east and then proceed clockwise to the other corners.

111 Some say that the first brick is to be placed in a pit lined with bricks (etc. . . .) the depth of which is not to exceed two-fifths (of the width?); it is to be put in the appropriate place by one clad in new clothes as mentioned above.

112 When[65] all is auspicious: the day, the fortnight, the planets, the time and the moment, the sage first of all arranges in the casket the images, the medicinal plants, the glittering gems, the eight metals such as gold (. . . etc.), the eight colouring substances such as antimony. Then, at night, the earths, the roots and the eight grains are installed at the bottom of the pit. Then, in the morning, after making an offering to the casket according to the rituals, he installs the foundation deposit in water.[66]

113-114 After the foundation deposit has been laid in place, at daybreak, complete and in conformity with the ritual, at the bottom of a pillar or of a door jamb, depending on whether a divine or human dwelling is involved, the pillar or the jamb should be installed exactly above the foundation deposit and in conformity with the rule. They must be perfect and strong. The architect is to put the jamb or the pillar in place after they have been purified with water from twenty-five vases covered with new cloth and with (paste) of white sandal and provided with all the beneficent objects.

Thus ends, in the *Mayamata*, treatise on dwelling,
the twelfth chapter: PLACING THE FOUNDATION DEPOSIT.

64. *Jhaṣālastambha, nikhātāṅghri*: see 15.9-11a. *Vimāna* is a common term to designate a 'temple' and is a synonym of *prāsāda* (see 19.10-12); however it is also used to designate a building with wagon-roof (26.100: *śālājātis tacchiroyug vimānam*).

65. This *sragdharā* verse gives a summary of the chapter.

66. See above note 3.

अथ त्रयोदशोऽध्यायः

[उपपीठविधानम्]

अधिष्ठानस्य [1]चाधस्तादुपपीठं प्रयोजयेत् ।
रक्षार्थमुन्नतार्थं च शोभार्थं तत् प्रवक्ष्यते ॥ १ ॥
समं त्रिपादमर्धं[2] वा पञ्चांशाद्व्यंशमेव वा ।
[3]सपादं वाऽथ सार्धं वा पादोनद्विगुणं[4] तु वा ॥ २ ॥
द्विगुणं वा प्रकर्तव्यमात्ताधिष्ठान[5] तुङ्गतः ।
[6]उत्सेधे दशभागे तु एकेनैकेन[7] वर्धनात् ॥ ३ ॥
[8]पञ्चांशान्तमधिष्ठानजन्माद् बाह्ये[9] तु निर्गमम् ।
दण्डं वा सार्धदण्डं वा द्विदण्डं वा त्रिदण्डकम् ॥ ४ ॥
[10]अधिष्ठानजगत्या [11]वा समं तत्पादबाह्यकम् ।
[12]वेदिभद्रं प्रतिभद्रं सुभद्रं च त्रिधा मतम्[13] ॥ ५ ॥

[वेदिभद्रम्]

उच्छ्रये भानुभागे तु द्व्यंशेनोपानमीरितम्[14] ।
[15]पद्ममंशं तदूर्ध्वेऽर्धं क्षेपणं पञ्चभागिकम् ॥ ६ ॥
[16]ग्रीवमर्धेन कम्पं स्याद् भागैकेनाम्बुजं भवेत् ।
[17]शेषांशं वाजनं[18] कम्पमष्टाङ्गमुपपीठकम् ॥ ७ ॥

1. F : वाधस्ताद्
2. D : अर्घ्यं for अर्धं
3. D and F : replace 5a between 2a and 2b.
4. D : त्रिपादद्विगुणं
5. D : अर्धाधिष्ठान-
6. A (var) : उत्सेध-
7. A (var) : भागेनैकेन; D : तुङ्गेनैकैक-
8. F : पञ्चांशाभम्
9. D : नाह्ये
10. D : अधिष्ठानस्य गम्या
11. C and D : वा समन्तात्
12. A (var) : वेदीभद्रं प्रतीभद्रं
13. C : च त्रिधामकम्
14. A (var) : पानदीरितम्
15. A (var), C : पद्ममंशे
16. A (var) : ग्रीवामध्येन
17. A (var) : शेषांकं
18. C : भाजनं for वाजनं

CHAPTER 13

THE SOCLE[1]

1-3 The socle is to be placed beneath the base to make (the building) higher, more solid and more beautiful.[2] Its height depends on that set for the base; it is equal to the latter or is three quarters, half or two fifths of it or it may be one and a half, one and three quarters or twice it.[3]

4-5 The projection of the socle in relation to the plinth of the base may be from one to five tenths of its height or it may be one module (*daṇḍa*) or one and a half or two or three modules or it may be equal to the projection of the plinth of the base in relation to the pillars (of the ground floor of the building).[4] There are three categories of socle (given as) *vedibhadra*, *pratibhadra* and *subhadra*.[5]

Vedibhadra socles

6-8 The height (of the socle) is divided into twelve (equal) parts: the plinth takes up two parts, a doucine one and the fillet which tops this

1. *Upapīṭha*: cf. *Mānasāra* (chapter 13), *Ajita* (chapter 11, see Dagens 1984, pp. 51-52 and Table I), *Īśānaśiva* (Kriyā. 30.68 sq.). *Śilparatna* (chapter 18). *Upapīṭha* serves as a supplementary base for the building and is placed beneath the base proper (*adhiṣṭhāna*); in no case those terms may be rendered by 'pedestal of column' (*upapīṭha*) and 'base of column' (*adhiṣṭhāna*) as P.K. Acharya did in his *Mānasāra* translation. For the terms used to designate the different mouldings in this chapter and the next one, see Dagens 1984 (especially pp. 38-49 and tables I to IV).
2. Socle is not undispensable and expressions such as *sopapīṭham adhiṣṭhānaṃ kevalaṃ vā* are frequently found in descriptions of buildings (e.g. 21.28, 22.33 . . .).
3. The socle may be of considerable height such at the one of Kilvelūr temple which is as high as the base and the first storey taken together.
4. *Nirgama* designates the projection of a moulding or of any other element calculated from the position of another element (like here the plinth of the base) or from the *mānasūtra* (see chapter 6 note 13). The module (*daṇḍa*, see 15.28-29) is very often used to measure projections or recesses.
5. Same names are used to designate *upapīṭha* types in other texts, but many discrepancies appear in the corresponding descriptions.

षडङ्गं वा विधातव्यमूर्ध्वाधस्ताद्[19] विनाम्बुजम् ।
[20]वेदिभद्रं द्विधा प्रोक्तं सर्वहर्म्येषु[21] योग्यकम् ॥ ८ ॥

[प्रतिभद्रम्]

[22]अश्विभ्यां च द्विकैकांशैर्भानुभागाङ्ककांशकैः ।
त्र्यंशैकांशकभागैस्तु द्वाभ्यामंशेन योजयेत् ॥ ९ ॥
[23]जन्मतो वाजनान्तं तु तुङ्गे [24]त्रिनवभागके[25] ।
पादुकं पङ्कजं कम्पं कण्ठमुत्तरमम्बुजम्[26] ॥ १० ॥
[27]कपोतमालिङ्गान्तादि [28]प्रतिवाजनमुच्यते[29] ।
प्रतिभद्रमिदं नाम्ना[30] सर्वालङ्कारसंयुतम् ॥ ११ ॥
[31]युग्मेशाक्षांशकांशैस्तु द्व्येकाष्टांशांशकांशकैः ।
[32]त्र्यंशैकेनांशकैर्द्वाभ्यामेकेनात्रैव योजयेत् ॥ १२ ॥
पादुकं पङ्कजं चैवमालिङ्गान्तरितं तथा ।
प्रत्यूर्ध्वे वाजनं [33]कण्ठमुत्तराब्जकपोतकम् ॥ १३ ॥
आलिङ्गान्तरितं चोर्ध्वे [34]प्रतिश्चैवोर्ध्ववाजनम् ।
द्विविधं प्रतिभद्रं स्यादेकभागाधिकं ततः[35] ॥ १४ ॥

[सुभद्रम्]

त्रिःसप्तांशे तदुत्सेधे द्वाभ्यां जन्म तथाम्बुजम् ।
[36]अर्धेन [37]कण्ठमर्धेन पद्मद्व्यंशेन वाजनम् ॥ १५ ॥

19. D : विघातव्यं मूर्धाधस्ताद्
20. A (var) : वेदीभद्रं
21. D : सर्वहर्म्येष्ट-
22. A et C : अश्विनीषुद्विकैकांशैः A (var), B : अश्विनीन्द्रनवांशैस्तु; D : आविभागनवांशैस्तु; E : अश्वनिदृक्षिवांशैस्तु ।
23. A (var) : जन्मनो
24. A (var) : वाजनन्तस्यतुङ्गे
25. A (var) : भागिके for भागके
26. D : कर्णमुत्तराम्बुजम्
27. A, B, C, E, F : कपोतपालिकान्तादि
28. E : वृत्ति- for प्रति
29. D : आचरेत् for उच्यते
30. D : नाम्नौ
31. D : द्वित्र्येकशिवद्वैकं स्याष्टांशांशकांशकैः ।
32. D : त्र्यंशांशकेनाशकैर्
33. E : कर्णम् for कण्ठम्
34. D : प्रीति for प्रति
35. D : एकैकभागिकं तथा
36. Verses 15b-22 are missing in F.
37. D : कर्णमध्येन

(doucine) one half, the dado five, a fillet one half and a doucine one; the remainder is for the upper string-course and the fillet (which surmounts it). Such a socle has eight mouldings, or six if the upper and lower doucines are omitted. There are thus two sorts of *vedibhadra* socles suitable for all buildings.[6]

Pratibhadra socles

9-11 The height (of the first *pratibhadra* socle) from plinth to string-course is divided into twenty-seven (equal) parts. The plinth takes up two parts, a doucine two, a fillet one, the dado twelve, (the fillet) which tops the dado one,[7] a doucine one, the dripstone three, and a fillet and a groove one each; the upper string-course[8] takes up two parts and its top-fillet one. A socle like this, furnished with all necessary ornaments, is called *pratibhadra*.[9]

12-14 (The height of) the second *pratibhadra* socle (is divided into) one part more (than the height of the first one). The plinth takes up two parts, the doucine three, a fillet one, and a groove one; the (lower) string-course takes up two parts, a fillet one, the dado eight and the (fillet) which tops it one; a doucine takes up one part, a dripstone three, a fillet one, a groove one, a fillet one, the (upper) string-course two and the fillet which tops it one.

Subhadra socles

15-17a The height (of the socle) is divided into twenty-one (equal) parts: the plinth takes up two, as does the doucine (which surmounts it); a groove takes up one-half, a doucine one-half, the string-course two; a doucine takes up one-half, as does the fillet which tops it; the dado takes up eight

6. *Ajita* (11.5-7a) gives a similar description but omits the six moulding alternative (Dagens 1984 Table I/I).
7. *Uttara* is used with the meaning of *uttarakampa;* the term designates elsewhere an architrave (chapter 16) or any similar upper element.
8. *Prati*: see 14.11 and 44-45 and notes *ad loc.*
9. *Cf. Īśānaśiva* Krīyā. 30.73-76; the *Mānasāra* (13.35-89) gives under the same name a different description.

[38]अर्धेनाब्जं तथा कम्पं [39]कण्ठमष्टांशमीरितम्[40] ।
[41]अंशेनोत्तरमर्धेन पद्मं गोपानकं त्रिभिः ॥ १६ ॥
भागार्धमूर्ध्वकम्पं[42] स्यादेतन्नाम्ना सुभद्रकम् ।
[43]जन्म द्व्यंशं त्रियंशेन पद्ममंशेन कन्धरम् ॥ १७ ॥
द्वाभ्यां वाजनमेकेन[44] कम्पमष्टांशकैर्गलम् ।
अंशेन कम्पकं द्वाभ्यां वाजनं कम्पमंशकम् ॥ १८ ॥
सुभद्रं द्विविधं प्रोक्तं सर्वालङ्कारसंयुतम्[45] ।
[46]सिंहेभमकरैर्व्यालैर्भूतैः पत्रैरलङ्कृतम्[47] ॥ १९ ॥
प्रतिवक्त्रं झषाढ्यं[48] स्याद् बालेनारूढमस्तकम् ।
[49]अर्पितानर्पिते[50] हर्म्ये सर्वत्र परिकल्पयेत् ॥ २० ॥
अङ्गमङ्गं प्रति प्राज्ञैर्वृद्धिर्हानिस्तथोच्यते[51] ।
[52]तथा मसूरकाणां तु युञ्जीयादुपपीठके ॥ २१ ॥
आत्ताधिष्ठानतुङ्गाद् द्विगुणमथ समं सार्धमर्धं त्रिपादं
पञ्चांशाद्व्यंशकं वानलसमभजिते द्व्येकमात्रोपपीठम्[53] ।
[54]सप्रत्यङ्गं समं चेत् [55]तदपि च महता वाजनेनोपयुक्तं
[56]सर्वस्निग्धान्यधस्ताद् दृढतरमतिना योजितव्यं बलार्थम्[57] ॥ २२ ॥

इति मयमते वस्तुशास्त्रे उपपीठविधानो नाम
त्रयोदशोऽध्यायः ।

38. E : अर्धेनांशं
39. D, E : कर्णम् for कण्ठम्
40. A (var) : अष्टाङ्गमीरितम्
41. D : अर्धस्योत्तरमध्येन पद्मकं पोतकं त्रिभिः
42. D : ऊर्ध्वगं पश्चात् for ऊर्ध्वकम्पं स्याद्
43. C : जन्म त्र्यंशेन पद्म च पद्मत्र्यंशेकन कन्धरम्
44. D : एकांशौ for एकेन
45. D : यद्वालङ्कारशोभितम्
46. A (var) : सिंहैश्च for सिंहेभ-
47. D : अलङ्कृतैः
48. A (var) : प्रतिवक्त्रं झषास्यं; D : प्रतिवक्त्रान्त्यष्टास्यां
49. D : omits 20b.
50. A (var) : अपितानर्पिता
51. A (var) : वृद्धिर्हानि यथोचितम् ; D : वृद्धिं हानिं यथोचितम्
52. C : अथा for तथा
53. A (var) : द्व्येकपत्रोपपीठम्; D : द्व्येकवक्त्रोपपीठम्
54. A (var), C : संप्रत्यङ्गं
55. A (var) : समन्तात् for समं चेत्
56. A (var) : सर्वस्त्रिग्धाभ्यधस्ताद्; F : सर्वस्मिन्धम्न्यधस्ताद्
57. A (var) and C : योजितं चोदयार्धम्

parts, the (fillet) which surmounts it one, a doucine half a part, the dripstone three and the top fillet one-half. This is a *subhadra* socle.[10]

17b-19a The second type of *subhadra* socle should have the following mouldings: a plinth with a height of two parts, a doucine of three parts, a groove of one part, a string-course of two parts and a fillet of one; the dado should have a height of eight parts, a fillet of one, the superior string-course two and the top fillet one.

19b-20 In all buildings, whether or not provided with an aisle,[11] the face of the string-course[12] is to be decorated with lions, elephants, *makara*, *vyāla*, dwarves, leaves (etc.) or with fish on whose heads ride infants.

21 The sages say that (the dimensions) of all the mouldings of the socle should be increased or diminished to bring them into proportion with those of the base.

22 The height[13] of the socle is double or one and half times that of the base or is equal to it, or it is half, three quarters or two-fifths, two-thirds or one-third of it. If however the socle is surmounted by a stereobate (its height) is equal to that of the base and the socle is to comprise a large upper string-course. In order that the socle be stable the wise man builds it upon all the proper elements.

Thus ends, in the *Mayamata*, treatise on dwelling,
the thirteen chapter: RULES FOR SOCLES.

10. *Aṃśumatkāśyapa* (5.20-23 quoted by N.R. Bhatt in *Ajitāgama*, vol. I, p. 66, note 8) describes a *saubhadra* socle with slight differences in the moulding names but with the same proportions (we indicate between brackets the moulding names used in *Mayamata* when different):

उपपीठस्य चोत्सेधे एकविंशतिभाजिते ।
उपानं (जन्म) तु द्विभागेन तत्सममम्बुजोदयम् ॥
कम्प (कण्ठ) मर्धेन कर्तव्यं पद्ममर्धेन कारयेत् ।
महापट्टी (वाजन) द्विभागेन पद्ममर्धेन कारयेत् ॥
कम्पमर्धेन कर्तव्यं कर्णोच्चं (कण्ठ) वसुभागधा ।
भागेन कम्प उत्तरमर्धेन पद्मकम्पे (पद्म) कपोतकम् (गोपानक) ॥
त्रिभिस्तत्कम्प (ऊर्ध्वकम्प) मर्धेन नाम्ना सौभद्रमुच्यते ॥

11. *Arpitānarpitaharmye*: cf. 21.64b-65.
12. *Prativaktra*: cf. 14.10.
13. This verse (*sragdharā* metre) is quoted in *Īśānaśiva* (vol. III, p. 306).

अथ चतुर्दशोऽध्यायः

[अधिष्ठानविधानम्]

[तत्राधिष्ठानवस्तुनिर्माणम्]

[1]तैतिलानां द्विजातीनां[2] वर्णानां गृहकर्मणि ।
तद्योग्यं द्विविधं वस्तु जाङ्गलानूपभेदतः[3] ॥ १ ॥
घनशर्करया युक्तमत्यन्तं खनने खरम्[4] ।
सितांशुतनुतोयाढ्यं जाङ्गलं[5] भूतलं भवेत् ॥ २ ॥
खननं क्रियमाणस्य वस्तुनश्च बलं यथा[6] ।
रूढोत्पलकृशेर्वारुसंयुक्तं[7] तनुवालुकम् ॥ ३ ॥
अनूपमिति विख्यातं खात्वैव[8] जलदर्शनम्[9] ।
[10]इष्टकोपलमृद्भिश्च वालुकैरपि[11] चिक्कणैः ॥ ४ ॥
[12]शर्कराभिः क्रमाच्छ्वभ्रं[13] निश्छिद्रं पूरयेत् स्थिरम्[14] ।
[15]घनीकृत्येभपादैश्च काष्ठ[16]खण्डैर्बृहत्तरैः[17] ॥ ५ ॥

1. Verses 1 to 9 are missing in F.
2. C, D : द्विजादीनां
3. D : जाङ्गलनाभेदतः
4. E : घनेन घनम्
5. D : तोयाढ्य-
6. D : वसनश्च वलं तथा; E : वस्तुनिश्च बलं यथा
7. A : -कृशेर्षादि; C : -कुशेर्वादि; D : नीलोत्पलस्य सेव्यादि; E : -कृशैर्वानि
8. A, B, E : खात्वैवा; D : खातृत्वा
9. A, B, E : जलदर्शनात; D : लज्ञदर्गमम्
10. D : इष्टकोपरि
11. A (var), E : वालुकैश्चापि
12. D : शर्करात् भूक्रमातंशुमृतिच्छिद्रं पूरयेत् स्थिरम्
13. C : शुभ्रं for श्वभ्रं
14. E : वरयेत् दृढम्
15. D : कृरीकृत्ये-
16. C, D : दण्डैर् for खण्डैर्; E : तुण्डैर्
17. A (var) : बृहच्छिखैः; D : बहिर्ध्रिरैः; E : बृहच्छिरैः

Chapter 14

THE BASE[1]

Preparing the ground[2]

1-4a For the building of houses of gods, brahmins and (other) classes there are two sorts of ground suitable, dry and moist.[3] 'Dry' terrain is well supplied with gravel, hard to dig and (when it is dug) rich in water clear as the moon. The terrain is 'moist' when the foundations, dug to the dimensions of the projected building,[4] reveal open blue lotuses and withered cucumbers along with white sand.

4b-8 After water has been reached the trench should be filled with bricks, earth and fine sand and packed tight so that there are no gaps,[5] then,

1. The base (*adhiṣṭhāna, māsuraka, tala* etc. see v. 40) is the first of the 'levels of elevation' (*varga*, infra note 9); cf. *Mānasāra* (chapter 14), *Ajita* (chapter 12, Dagens 1948, pp. 52-54 and Tables II/a and b), *Īśānaśiva* (Kriyā. 31.1-29), *Śilparatna* (17.1-14 and chapter 19). A list of types of base is given by N.R. Bhatt in his *Ajitāgama* edition (vol. 1 p. 91).
2. The beginning of the chapter does not deal directly with the base but with an examination of the site to be done according to a method slightly different from the one prescribed in chapters 3 and 4. According to *Śilparatna* (10.16) this examination must take place before the setting of the gnomon (see chapter 6).
3. In *Arthaśāstra jāṅgala* and *anūpa* designate two kinds of agricultural land differenciated by the quantity of rain they receive (II.24.5: *ṣoḍaśadroṇaṃ jāṅgalānāṃ varṣapramāṇam, adhyardham anūpānāṃ deśavāpānām . . .*; for other references see Kane vol. III, p. 132). According to *Śilparatna* (10.1-3) the two kinds of land suitable for construction are called *snigdha* and *asnigdha*:

 स्निग्धं चैव तथास्निग्धं द्विविधं भूमिलक्षणम् ।
 चिक्कणा शर्कराढ्या वाप्यशक्यखननक्रिया ॥
 या सा स्निग्धा मही ख्याता तनुवालुकसंयुता ।
 पुरुषाञ्जलिमात्रे तु दृष्टा तोयसमन्विता ॥
 अक्लेशात् खननं यत्र सा स्निग्धाख्या मही स्मृता ।
 हस्तमात्रं खनेत् स्निग्धभूवमन्यत् तथाजलम् ॥

4. *Kriyamāṇasya vastunaś ca balaṃ yathā*: "according to the strength of the intended buildings".
5. All this will serve as foundations for the building.

तत्खाते सलिलेनैव पूरितेऽक्षयता शुभा ।
[18]समत्वं सलिलेनैव साधयित्वा[19] विचक्षणः ॥ ६ ॥
गर्भं प्रक्षिप्य[20] तं नीत्या होमं[21] तत्र निधापयेत् ।
स्तम्भद्वित्रिगुणव्यासं[22] तदर्ध[23]बहलान्वितम् ॥ ७ ॥
उपानोपरि पद्मं चोपोपानं च[24] तदूर्ध्वतः ।
यथाशोभांशमानेन[25] कुर्यात् तत्र विचक्षणः ॥ ८ ॥

18. C : समं तु
19. D : सलिलं नैव स्वाधयित्वा
20. C : निक्षिप्य
21. A (var) : नित्योपानं; C : नित्योवने
22. C : व्यासात्
23. C : तदर्धं for तदर्ध-
24. D : न for च
25. E : शोभाङ्गमानेन

when this has been stamped down by the trampling of elephants as well as with large logs of hard wood,[6] the sage, after having filled up the (remaining) hollow with water which, (if the enterprise is) to be successful, it will retain, must verify the horizontality of the ground with this water.[7] Next the foundation deposit should be laid down according to rule and, lastly, the adjustment slab should be set in place;[8] this is two or three times as wide as a pillar and its thickness is half its width. Above this slab is a lotus and a secondary slab, the proportions of which are imposed upon the sage by the harmony.

6. Or "with huge logs shaped like elephant foot".
7. See 4.16 sq. and 6.3.
8. *Homa*: the emendation proposed in Trivandrum edition (*nityopānam* for *nityā homam*) does not seem necessary as *homa* appears elsewhere as a synonym of *upāna* (see 12.42: *homastambha* placed upon the foundation deposit). Such slabs form the adjustment layer placed just above the foundations and upon which will be established the base. While not being always clear, the *Śilparatna* (19.102-07a) gives some details on the subject:

यत्र प्रासादकरणं तले तत्र समीकृते ।
होमं विन्यस्य परितस्तत्तद्द्रव्यैर्यथोदितैः ॥
भित्तिपादस्य विष्कम्भं द्विगुणं त्रिगुणं तु वा ।
होमानीप्रमिति ख्यातं तद्बाहल्यं तदर्धतः ॥
मानसूत्राद् बहिर्नीप्रं द्वित्रिदण्डमथापि वा ।
होमानीप्रं पुनः प्रोक्तमुपपीठं गलात्तु वा ॥
अधिष्ठानजगत्या वा पादुकाद्वा विमानके ।
होमोर्ध्वेऽब्जे प्रकर्तव्ये तत्पीठाद्धोमनिष्क्रमः ॥
पद्मस्य वेशरस्योच्चं समं पादोनमेव वा ।
तदूर्ध्वे वापि चाद्यङ्गं होमोर्ध्वे वोपपीठकम् ॥
तदूर्ध्वेऽब्जमधिष्ठानं वा करोतु यथारुचि ॥

Our translation: "The ground is to be levelled at the place where the temple is to be built; then the *homā* is established with all the prescribed elements. The projection of the *homā* (outside the *mānasūtra*) [see 15.57] is two or three times the width of the pilasters (*bhittipāda*) and its thickness is half its width; otherwise the projection of the *homā* outside the *mānasūtra* is of two or three modules; otherwise, in the case of a temple, the projection of the *homā* is the same as the projection of the socle (*upapīṭha*) from the dado (*gala*) of the base or from its (main) plinth (*jagati*) or from its (secondary) plinth (*pāduka*). Then a doucine (*padma*) is to be established above the *homā* and the *homā* projection from the lower part of that doucine is equal to the height of the *padma veśara* (??) or less by a quarter. In order to obtain a beautiful effect, place the base (*ādyaṅga*, see *Mayamata* 14.40) above (the *homā*) or the socle above the *homā* or the doucine (*abja*) and the base above (the *homā*)."

उन्नतां प्रकृतिं[26] भूमिं कृत्वा हस्तप्रमाणतः ।
[27]घनीकृत्य तदूर्ध्वस्थमुपानं[28] जन्म चोच्यते ॥ ९ ॥
[29]तदूर्ध्वस्थमधिष्ठानं सोपपीठं[30] तु केवलम् ।
सस्तम्भं वा सकुड्यं वा जङ्घावर्गं तदूर्ध्वगम् ॥ १० ॥
[31]भूमिदेश इति ख्याता कपोतोर्ध्वगता प्रतिः[32] ।
प्रासादादीनि वास्तूनि चाधितिष्ठन्ति यद्धि तत्[33] ॥ ११ ॥

[अधिष्ठानोन्मानम्]

अधिष्ठानं तदुन्मानं[34] जाति[35] भूमिवशाद् द्विधा[36] ।
तैतिलानां चतुर्हस्तं त्रिहस्तार्धं द्विजन्मनाम् ॥ १२ ॥
नृपाणां त्रिकरं [37]सार्धद्विहस्तं यौवराजकम्[38] ।
[39]द्विहस्तं [40]वणिजामेकहस्तं शूद्रस्य कीर्त्यते[41] ॥ १३ ॥
एतज्जातिवशाद् भूमिवशादत्रैव कथ्यते ।
[42]दण्डात् षण्मात्रहान्या तु द्वादशाद्यात्[43] त्रिभूमिकम्[44] ॥ १४ ॥
[45]त्रितलस्योत्तमस्येष्टं पादेनोनं द्विहस्तकम् ।
[46]क्षुद्राणामनया[47] नीत्या विधातव्यं विचक्षणैः ॥ १५ ॥

26. D : प्रकृतं
27. D : omits 9b.
28. A (var) : -स्थ उपानं; C : तदुपानं
29. A (var) : तद्वदूर्ध्वम् for तदूर्ध्वस्थम्
30. D : चोपपीठं
31. D : omits 11a.
32. E : वृत्तिः for प्रतिः
33. E : यत् for तत्
34. F : तुतलाम for तदुन्मानं
35. C : यति for जाति
36. D : द्विधम्
37. C and D : सार्धं for सार्ध-
38. E : युवराजकम्
39. E : omits 13b.
40. D : वैश्यजाम्
41. A (var) : कीर्तितम्; D : कर्तयेत्
42. D : दण्डाचतुर्हस्तान्तु द्वादशान्यात् त्रिभूमिकान्
43. C : द्वादशाद्यान्
44. A, C, F : त्रिभूमिकात्
45. A (var), C, F : त्रितलस्योत्क्रमस्येष्टं
46. D : क्षुद्राणां धनादित्या विधातव्या विचक्षणाम्
47. C : चानया for अनया

9-11a The regulating course called 'origin' should be laid down after the original ground has been raised one cubit and has been rendered compact. Directly above this is the base unless there is a socle (beneath it); above the base is the (so-called) 'level of the pillars' which is made up of pillars or of a wall.[9] The height of (the ground) floor is the same as that of the stereobate[10] which is above the dripstone (of the base).

11b-16 The base is that upon which buildings such as temples rest. Its height may be determined in two ways, according to the number of the storeys (of the building) or to the caste. For the gods that height is four cubits, for brahmins it is three and a half cubits, for kings three cubits, for crown princes two and a half, for merchants two and, lastly, for śūdra, one cubit. Such are the heights of the base according to caste. Herewith these, (calculated) according to the number of storeys, starting with a height of one pole (i.e. four cubits) for the base of a building with twelve storeys and decreasing by six digits (for each storey less) down to buildings with three storeys, the largest of which have a base one and

9. *Jaṅghāvarga*: *varga* are horizontal divisions of the building; these levels of elevation get their names from the structural levels to which they correspond roughly; they are of six kinds: level of base, of the pillars, of the entablature, of the attic of the roof and of the finial (see Dagens 1984 pp. 49-50). The *Jaṅghāvarga* (*ibid.*, pp. 54 sq.; infra chapter 15) which corresponds to the 'inhabitable' portion of the building (or of a storey if the building is multistoreyed) is most of the time designated as 'pillar' (*stambha, pāda, jaṅghā* . . .) even if it does not comprise any pillar or pilaster.

10. *Bhūmideśa*: *bhūmi* (*tala, bhū* etc.) designates a 'storey' (which comprises a 'level of pillars' and an entablature) (Dagens 1984 p. 50), the first storey standing upon the base. *Prati*: the term is ambiguous (as are its numerous synonyms: *vedī, vedikā, vitardi, vṛti, paṭṭikā*, etc.). It may be applied to a moulding (a string-course placed at the top of a mouldered ensemble, especially base and entablature) as well as to a supplementary level of elevation which we may call 'stereobate'. That last can be placed between the base and the level of pillars of the ground storey or between the entablature of a storey and the level of pillars of the storey which tops it (in that case it is sometimes called *antaraprastara* or *madhyamamañca*: 'intermediate entablature', cf. chapter 20 note 9) or between the entablature of the last storey and the attic. It is not always easy to know if a *prati* mentioned in relation with a base is the top moulding of that base or the stereobate placed above it. The stereobate plays an important role in the laying out of doors (see infra vv. 45-46).

[48]तत्तत्पादोदयार्धेन[49] षडष्टांशोनमानतः ।
अधिष्ठानस्य चोत्सेधं वास्तुवस्तुनि भूवशात् ॥ १६ ॥
[50]यदुपानस्य निष्क्रान्तं[51] तत् त्र्यंशेन विभाजयेत्[52] ।
[53]त्यक्त्वैकांशं बहिस्तत्र[54] जगतीं कारयेद् बुधः ॥ १७ ॥
[55]तद्वत् कुमुदपट्टं[56] च तद्वत् कण्ठस्य[57] वेशनम् ।
[58]आत्तोत्सेधांशमानं तु भागमानेन वक्ष्यते ॥ १८ ॥

[पादबन्धम्]

अष्टसप्तशशिबन्ध[59]भागिक[60]श्चन्द्रबन्ध[61]शशिभागिकैः क्रमात् ।
[62]वप्रकं कुमुदकम्प[63]कन्धरं कम्पवाजनमधोर्ध्वकम्पकम्[64] ॥ १९ ॥
पादबन्धमुदितं तदुच्छ्र्ये
[65]भानुभिर्द्विगुणितांशके[66] कृते ।
देवविप्रनृपवैश्यशूद्रके-
ष्वेवमुक्तमृषिभिः पुरातनैः ॥ २० ॥

48. F : omits 16-18a; A (var), B (var), D, E and F add after 15b : मसूरकोन्नतं पञ्चहस्ते द्वात्रिंशदङ्गुलम्। त्रिंशदङ्गुलमूलं वा द्विद्व्यङ्गुलविवर्धनात्॥ अष्टत्रिंशतिमात्रोच्चं त्रयोदशविशालिनः । षडादीनां तु पञ्चानामेकत्रिंशतिमात्रकः ॥ नवत्रिंशतिमात्रोच्चं चतुर्दशकरस्य तु । त्रिचतुर्हस्तयोर्धाम्नोस्तन्नीत्यैव विचक्षणः । आत्तोत्सेधांशमानेन वाधिष्ठानोच्छ्र्यं विदुः ॥ कैश्चित् तेन प्रकारेण विधातव्यं विचक्षणैः ।
49. D : तत्तत्पादार्द्धयार्धेन
50. D : तद् for यद्
51. E : निष्टातं
52. A (var) : तत्र त्र्यंशेन भाजयेत्
53. D : एकैकांशं for त्यक्त्वैकांशं
54. D : तस्य instead of तत्र
55. D : तत्तद् ; E : यद्वत्
56. C : -पादं instead of पट्टं
57. D : कर्णञ्च
58. D : adds : अग्रपट्टस्य विस्तारात् कपोतकं तु वेशनम् ।
59. D : वह्नि for बन्ध
60. A : भागकैश्च-
61. D : वह्नि for बन्ध
62. A (var), C : वक्त्रकं
63. C : कुमुदकं च for कुमुदकम्प-
64. D : कम्पपट्टिकस्योर्ध्वं तु कम्पकम्
65. D : भानुभू-
66. C : गुणिकांशके

three quarter cubits high. Another method of calculating the height of the base is indicated by the sages for smaller buildings: this height should be equal to half that of the corresponding pillar less a sixth or an eighth. Such is the height of the base calculated according to the number of the storeys of the building.

17-18a The sage will make the projection of the plinth (of the base) one-third less than the projection of the regulating course;[11] the projection of the torus and the string-course and the recess of the dado are equal (to the projection of the plinth).

18b The number of parts into which the given height (of a base) should be divided and how they should be distributed is now indicated.

Pādabandha base

19-20 The height (of the base) is divided into twenty-four parts: the plinth[12] takes up eight parts, the torus seven, a fillet one, the dado three,[13] a fillet one, the upper string-course three and its two flanking fillets one. Such is the *pādabandha* base which is prescribed by the sages for buildings intended for gods, brahmins, kings, vaiśya and śūdra.[14]

11. *Upāna*: see above note 8.
12. *Vapra* designates a wall or a glacis; its use here is probably justified by the plinth being vertical as a wall.
13. *Bandha* for according to Sāṅkhya there are three mundane bondages (*prakṛtibandha*, *vaikārika*⁰ and *dakṣiṇā*⁰).
14. Thus such a base my be used for any building; see also infra vv. 45-46 where it is told that the *pādabandha* base may be interrupted by a door, which explains that it is prescribed for gateways (24.28).

[उरगबन्धम्]

[67]चन्द्रदृक्शशिशिवांशकै रसैर्धातुभिश्च[68] समभागिकैः क्रमात् ।
वाजनं प्रतिमुखं त्रियश्रकं दृक् च वृत्तकुमुदं[69] तु वप्रकम् ॥ २१ ॥
त्रिःषडंशसमभागिके तले नागवक्त्रसदृशं प्रतिद्वयम्[70] ।
देवविप्रनृपमन्दिरेषु तद्योग्यकं ह्युरगबन्धकं[71] भवेत् ॥ २२ ॥

[प्रतिक्रमम्]

अंशाध्यर्धार्धभागैर्मुनिरसशशिभिश्चन्द्रदृक्च्छैवभागैः[72]
क्षुद्रोपानाब्जकम्पं जगतिकुमुदकं धारया युक्तमूर्ध्वे ।
आलिङ्गान्तादिकं तत्प्रतिमुखमथ तद्वाजनं पद्मयुक्तं
त्रिःसप्तांशे तलोच्चे[73] करिहरि[74]मकर[75]व्यालरूपादि भूष्यम् ॥ २३ ॥
प्रतिक्रमं तत् सुरमन्दिरोचितं[76]
विचित्रितं पत्रलतादिरूपकैः ।
द्विजन्मभूमीश्वरयोर्मतं गृहे
[77]शुभप्रभं पुष्टिकरं जयावहम् ॥ २४ ॥

[पद्मकेसरम्]

[78]एकद्व्येकेन षड्भिः शशिशिवशशिभिर्वेद[79] चन्द्रैकभागै-
र्द्व्यंशैकेनांशनेत्रैः शिवशशिसमभागेन[80] जन्माब्जकं च ।
[81]वप्रं पद्मं गलाब्जं कुमुदमुपरि पद्मं च कम्पं गलं तत्
कम्पं पद्मं च पट्टीकमलमुपरिकम्पं[82] च षड्विंशदंशे[83] ॥ २५ ॥

67. D : चन्द्रयुग्मशशिव्योमदंशके
68. E : चतुर्भिः; F : वाजिभिः
69. D : गलकुमुदं
70. D : हि कद्वयम्
71. C, D : ह्युरकवन्धकं; F : ह्युरगबन्धनं
72. E : चैवभागैः
73. E : तथोच्चे
74. C : हय for हरि
75. D : मकरैर् for मकर-
76. F : सुरमन्दिशोभितं
77. A, B, C, E, F : इभप्रभं
78. C : एकद्वैकोन
79. A, C, D, E, F : बन्ध- for वेद-
80. A, B, C, E, F : भागोन
81. C : वक्त्रं
82. A (var) : तम्पं
83. D : अंशैः

Uragabandha base[15]

21-22 (The height of the base) is divided into eighteen equal parts: the top-fillet takes up one part, the upper string-course two, a champfered fillet one, a talon (?) three, the well rounded torus six and the plinth five. This is an *uragabandha* base which, furnished as it is with two string-courses, resembles a serpent's mouth (?); it is suitable for the palaces of gods, brahmins and kings.

Pratikrama base

23-24 The height of the base is divided into twenty-one (equal) parts: the small plinth[16] takes up one part, a doucine one and a half and a fillet one half; the main plinth takes up seven parts, the torus six, its talon one, and two flanking fillets one each; the upper string-course takes up two parts and its fillet, decorated with lotuses, one. Such a base, decorated with images, elephants, *makara, vyāla* (. . . etc.), is called *pratikrama* and is appropriate for temples and, when decorated with foliage and creepers, is suitable for the houses of brahmins and kings, bringing happiness, prosperity and victory.

Padmakesara base

25-26 (The height of the base) is divided into twenty-six (equal) parts: the (first) plinth takes up one part, a doucine two, a (second) plinth one, a (second) doucine six, a groove one, a (third) doucine one, a reed one, a (fourth) doucine four, a fillet one and a groove one; a string-course takes up two parts, a (fifth) doucine one, the upper string-course two, a

15. The *uragabandha* base is described starting from the top and not from its lower mouldings as it is the case for other bases. Cf. *Mānasāra* (14.40-41).

16. *Kṣudropāna*: the base described here (the following ones as well) is of a two register type and its lower register comprises a small plinth and a doucine (for similar types described in *Ajitāgama*, see Dagens 1984 Tables II/1 and 2).

पद्मकेसरमेतदुदाहृतं कम्पवाजनपङ्कजकैर्युतम्[84] ।
कुम्भवप्रयुतं च सकन्धरं[85] शम्भुधामनि तत् प्रविधीयते[86] ॥ २६ ॥

[पुष्पपुष्कलम्]

भागेष्वेकार्धकार्धैस्तदुपरि चतुरंशैस्तथार्धांशकार्धै-
द्व्यर्धांशार्धद्विभागैस्तदुपरि च तथार्धांशकार्धेन जन्मम् ।
[87]वप्रं कञ्जं गलाब्जं तदुपरि कुमुदं पङ्कजं कम्पकण्ठं
कम्पं पद्मं महावाजनमुपरिदलं कम्पकं पङ्कजाढ्यम्[88] ॥ २७ ॥
पुष्पपुष्कलमेतदुदाहृतं कल्पितं नवपङ्क्तिभिरुच्छ्रये । ।
[89]शिल्पिभिः प्रसरैरपि[90] पूजितामूर्ध्वमध्यममुखे विमानके ॥ २८ ॥

[श्रीबन्धम्]

द्वाभ्यामेकेन सप्तांशकशशिशिव[91]वेदैकचन्द्राग्निभागै-
रेकेनैकेन वेदैः शिवशशिनयनैकेन मोहामराब्जम्[92] ।
हृत्पद्मं कैरवाब्जं[93] गलधरगलकम्पं दलं तत्कपोतं
[94]चालिङ्गान्तादिकं तत्प्रतिमुखमथ तद्वाजनं पङ्कजाढ्यम् ॥ २९ ॥
[95]श्रीबन्धं स्यादेतदुच्चे चतुर्वस्वंशे कुर्याच्छान्तधीर्वर्धकिस्तत्[96] ।
[97]देवेशानां मन्दिरेष्वेवमुक्तं श्रीसौभाग्यारोग्यभोग्यं ददाति ॥ ३० ॥

84. D : युक्तम्
85. D : सकस्वरं; E : सकुबरं
86. C : हिं तद् विधीयते
87. E : वप्रं चाब्जं गलाब्जं
88. E : A, B, C, E, F : कण्ठजाढ्यम्
89. D : शिल्पविप्रवरैरस पूजितं स्थल्यमध्यममुख्यविमानकैः ।
90. A : प्रसरेरपि; C : प्रवरकैश्च
91. A (var) : शशिव- instead of शशिशिव-
92. E : जन्मं पुराब्जम्
93. C : केवलाब्जं
94. A, B, F : द्विलिङ्गान्तादिकं; E : मालिङ्गान्तादिकं
95. E : श्रवलं
96. D : कुर्याच्छायतीथिर्वर्धकीस्तत्
97. E : देवादीनां

(sixth) doucine one and the top fillet one. Such is the *padmakesara* base which is furnished with fillets, string-courses and doucines as well as with torus, plinth and grooves; it is prescribed for the temple of Śambhu.[17]

Puṣpapuṣkala base

27-28 The height of the base is divided into nineteen parts: the (small) plinth takes up one part, the main plinth five, a doucine one, a groove one-half, half, a doucine one half, the torus which comes next four; then, a doucine takes up half a part, a fillet one-half, a small dado two, a fillet one-half, a doucine one-half, a string-course two and the row of leaves which surmounts it one-half and, lastly, the top-fillet takes up half a part. Such a base, furnished with several doucines, is called *puṣpapuṣkala* and is prescribed by the foremost amongst the artisans for medium and large temples.

Śrībandha base

29-30 The height (of the base) is divided into thirty-two parts: the (small) plinth[18] takes up two parts, a doucine one, the main plinth seven, a (second) doucine one, a third (doucine) one, a (fourth) doucine four, a groove one, a talon one, a dado three, a fillet one, a row of leaves one, the dripstone four and each of the two fillets which flank it one; the upper string-course takes up two parts and the top-fillet one. This base, furnished with several doucines, is called *śrībandha*. It must be established by an able *vardhaki*[19] is suitable for the palaces of gods and kings and brings good health and prosperity.

17. The *Mānasāra* (14.7-91) describes several *padmakesara* bases which are all characterized by the same thin mouldings and numerous doucines found here.
18. *Mohāmara*: literally 'the immortality of suffering', that is to say the 'birth' which leads us to the 'plinth' often called *janman* . . .
19. *Vardhaki*: see 5.22.

[मञ्चबन्धम्]

तुङ्गे षड्विंशदंशे खुरमथ[98] जगतीकैरवं कम्पकण्ठं
कम्पं पद्मं कपोतं तदुपरि च तथा निम्नमन्तादिवक्त्रम् ।
कम्पं भागेन षड्भिः शरशशिगुणचन्द्रैकबन्धांशकांशै-
र्द्वाभ्यामेकेन कुर्यादमरनरपतेर्मन्दिरे मञ्चबन्धम् ॥ ३१ ॥

[श्रीकान्तम्]

आलिङ्गयुक्तमथ चान्तरितप्रतीभ्यां[99]
तद्वाजनेन च वियुक्तकमेतदेव[100] ।
श्रीकान्तनामकमसूरकमष्टकोणं
वृत्तं तु वा कुमुदमम्बरमार्गिणां तत् ॥ ३२ ॥

[श्रेणीबन्धम्]

एकद्व्येकर्तुवेदैः[101] शशिनयनशिवद्व्येकदृक्चन्द्रसार्धा-
र्धांशैर्जन्माब्जकम्पं जगतिकुमुदकं कम्पकण्ठं[102] च कम्पम् ।
पद्मं पट्टं च कण्ठं तदुपरि च तथा वाजनाब्जं च पट्टं[103]
[104]श्रेणीबन्धं सुराणामुदितमिदमलं तुङ्गषड्विंशदंशे[105] ॥ ३३ ॥

[पद्मबन्धम्]

[106]सार्धार्धैष्वंशकांशैर्गुणशशिशिवचन्द्रद्विकैकेन[107] जन्म-
क्षुद्रं पद्मं धृगब्जं कुमुदमुपरि पद्मं[108] तथालिङ्गमूर्ध्वे ।
आलिङ्गान्तः प्रतिर्वाजनमथ मतिमान् योजयेत् त्रिःषडंशे
तुङ्गे देवेश्वराणामिदमुदितमगारेऽनघं[109] पद्मबन्धम् ॥ ३४ ॥

98. D : पुरमथ for खुरमथ
99. C : चान्तरितं प्रतीच्यां
100. A (var), C : कवियुक्तकमेतदेव
101. C : एकद्व्येकं तु वेदैः
102. E : कम्पकर्णं
103. E : पट्टि
104. D : श्रोणिबन्धं
105. D : अंशैः
106. D : सार्धार्धे पञ्चश्वंशांशौ गुणराशिचन्द्रद्विकैकेन
107. A (var), E : चैन्द्रद्विकैकेन
108. C : कम्पं instead of पद्मं
109. A (var), C, D : (अ)घनं for (अ)नघं

Mañcabandha base

31 The height of the base is divided into twenty-six equal parts: the false plinth[20] takes up one part and the main plinth six, a doucine above that takes up five parts, a fillet one, the dado three, another fillet one, a doucine one, the dripstone three and the groove topping it one and a fillet one; the upper string-course[21] and the two top-fillets take up one part. Such is the *mañcabandha* base which should be used for the palaces of gods and of kings.

Śrīkānta base

32 When the base is furnished with a projecting fillet together with a groove and an (upper) string-course (?) which has no top-fillet, it is called *śrīkānta*; its torus is octagonal or rounded and it is suitable for the denizens of the sky.[22]

Śreṇībandha base

33 The height of the base is divided into twenty-six (equal) parts: the small plinth takes up one part, a doucine two and a fillet one; the main plinth above that takes up six parts, the torus four, a fillet one, a groove two, a fillet one, a doucine two, a fillet one, a groove two, a fillet one, a doucine one and a half and the top fillet one. This *śreṇībandha* base is appropriate only for gods.

Padmabandha base

34 The height of the base is divided into eighteen (equal) parts: the plinth takes up one and a half parts, a small (fillet) one half, a doucine five, a talon one, a doucine three, a reed one, a doucine one and a fillet, above that, one. Then, a fillet which is below (the string-course) takes up one part, the upper string-course two and the top fillet one. Such is the *padmabandha* base which should be used by the sages for the houses of the principal gods[23] without there being any error.

20. *Khura*: 'hoof'.
21. *Vaktra*: 'the (decorated) face (of the moulding)' cf. *prativaktra* (13.20).
22. A less elliptical description is found in *Mānasāra* (15.350).
23. *Deveśvarāṇām*: or 'of the gods and the kings'.

[वप्रबन्धम्]

द्व्येकैकांशैः शरांशैर्युगशशिशिवदृक्[110] चन्द्रशैवाश्विनीभि-
भंगैनोपानकव्जं[111] तदुपरि च तथा कम्पवप्रं च कुम्भम्[112] ।
पद्मं पट्टं च कण्ठं[113] तदुपरि च तथा कम्पपद्मं च पट्टी-
पट्टं तद्वप्रबन्धं तदपि च सहितं[114] सद्विकैर्विंशदंशैः ॥ ३५ ॥

[कपोतबन्धम्]

तदेव वृत्तं कुमुदं तु वाजने कपोतयुक्त हि कपोतबन्धकम् ।

[प्रतिबन्धम्]

तदेव वेदैः[115] प्रतिवाजनं प्रतिस्त्रिकाश्रयुक्तं प्रतिबन्धमुच्यते ॥ ३६ ॥

[कलशाधिष्ठानम्]

एकद्व्येकाग्नि[116] भागैः शशियुगलशिवद्व्येकचन्द्रेशदृग्भि-
श्चन्द्रैकैकाक्षिचन्द्रैः[117] खुरकमलमथो कम्पकण्ठं च कम्पम् ।
पद्मं पट्टाब्जनिम्नं कमलमुपरि कुम्भं दलं[118] निम्नमन्ताद्
या स्याच्चोर्ध्वे प्रतिर्वाजनमथ कलशाख्येन भागास्त्रिरष्टौ ॥ ३७ ॥

[अधिष्ठानसामान्यलक्षणम्]

एतानि भेदैस्तु[119] चतुर्दशैव प्रोक्तानि तज्ज्ञैस्तु मसूरकाणि ।
सर्वाणि नास्यङ्घ्रियुतानि युक्त्या[120]दृढीकृताङ्गानि मयोदितानि ॥ ३८ ॥

110. C : जन्मचवाश्विनीभिर् ; D : चन्द्रचैकाश्विनीभिर् ;
111. A (var) अब्जं for कव्जं; E : कम्पे
112. A (var), C : कम्पवप्रत्यकुम्भम्
113. E : कम्पं for कण्ठं
114. D : समं instead of सहितं
115. D : वेदे
116. E : अब्धि for अग्नि
117. C : कांशैः
118. D : दल-; E : नत्वं
119. D, E : भेदेन
120. D : युक्ता

Vaprabandha base

35 (The height of the base) is divided into twenty-two equal parts: the small plinth takes up two parts, a doucine and the fillet which tops it one each. The main plinth takes up five parts, the torus four, a doucine one, a fillet one, a recessed strip two, a fillet one, a doucine one, the upper string-course two and the fillet which tops it one. Such is the *vaprabandha* base.

Kapotabandha base

36a When the torus is well rounded and when there is a dripstone at the top of the base it is a *kapotabandha* base.[24]

Pratibandha base

36b When the upper string-course and the top fillet together take up four parts and when the torus resembles a champfered string-course the base is called *pratibandha.*

Kalaśa base

37 (The height of the base) is divided into twenty-four (equal) parts: the plinth (*khura*) takes up one part, a doucine two, a fillet one, the dado three, another fillet one, a (second) doucine two, a (third) fillet one, a (third) doucine two, a groove one, a (fourth) doucine one, a reed two, a row of leaves one, a groove one and each of the fillets which flank it one; the upper string-course takes up two parts and the top fillet one. Such a base is called *kalaśa*.

Characteristics common to all bases

38-39 Such, with their characteristics, are the fourteen varieties of base prescribed by the sages. If expedient, any one of them may be provided with small pillars and false dormer-windows[25] and the elements which I have indicated may be reinforced. In order to make the base more solid the wise man should add or subtract (to the proportions indicated) one part or half, three quarters or one quarter of a part, or (he should add or

24. See *Ajita* 13.6-7 (Dagens 1984 Table II/1).
25. Small pillars must be on dado, and dormer-windows (so called *kuḍu*) on dripstone.

भागेनार्धत्रिपादाङ्घ्रिभिरथ युगलाध्यर्धचन्द्रार्धपादै-
मत्रैर्वृद्धिश्च हानिर्दृढतरमतिना योजितव्या बलार्थम् ।
शोभार्थं भागमङ्गप्रतिवरसमनीचाल्पहर्म्ये तलाना-
मेवं प्रोक्तं [121]यमीन्द्रैरविकलमतिभिस्तन्त्रविद्भिः पुराणैः ॥ ३९ ॥

[अधिष्ठानपर्यायनामानि]

मसूरकमधिष्ठानं वस्त्वाधारं धरातलम् ।
तलं कुट्टिममाद्यङ्गं पर्यायवचनानि हि ॥ ४० ॥

[निर्गममानम्]

यावज्जगतिनिष्क्रान्तं तावत् कुमुदनिर्गमम् ।
अम्बुजानां तु सर्वेषामुत्सेध[122]समनिर्गमम् ॥ ४१ ॥
[123]दलाग्रतीव्रमुत्सेधात्[124] पादं पादार्धमेव वा ।
वेत्राणामपि[125] सर्वेषां चतुर्भागैकनिर्गमम्[126] ॥ ४२ ॥
तत्समं वा त्रिपादं वा महावाजननिर्गमम् ।
एवं तीव्रक्रमं[127] प्रोक्तं शोभाबलवशात् तु वा[128] ॥ ४३ ॥
प्रवेशनिर्गमं कुर्यात् सर्वाङ्गानां मसूरके ।

[अधिष्ठानप्रतिच्छेदविधिः]

प्रतिच्छेदं न कर्तव्यं सर्वत्रैवं विचक्षणैः ॥ ४४ ॥
[129]द्वारार्थं यत् प्रतिच्छेदं सम्पद्द्वारं च नेत्यलम्[130] ।

121. E : मुनीन्द्रैर्
122. D : उत्सेधं
123. E : omits 42a.
124. D : दनाग्रनीव्रमुत्सेधं
125. D : चैव for अपि
126. D : उच्छ्र्ये पादनिर्गमम्
127. D : नीव्रक्रमं; E : निम्नकमं; F : निर्गमं
128. D : यत् instead of वा
129. D : द्वारार्थवत्
130. D : सम्पदानां च नेत्यहम् .

subtract) two digits, one and a half digits or one-half or one quarter of a digit. If the whole is to be harmonious it is essential that the proportions of the base be related to those of the building, whether it is large, medium, small or very small; thus affirm the ancients who had mastered their passions, whose intelligence was unrivalled and who were well versed in the Tantra.

Synonyms

40 *Masūraka*, *adhiṣṭhāna*, *vastvādhāra*, *dharātala*, *tala*, *kuṭṭima* and *ādyaṅga* are synonyms (whose meaning is base).[26]

Dimensions of projections

41-44 The projection of the torus is as great as that of the plinth; that of doucines is always equal to their height; that of the top of the row of leaves is a quarter or an eighth of the row's height; that of the string-course is equal to its height or to three quarters of it. The projection and recess of all mouldings are to be calculated according to the rule which has been given above or according to the appearance and solidity sought.

26. *Tala* also designates a 'storey' and *kuṭṭima* a 'paved street' (cf. 9.38).

पादबन्धमधिष्ठानं छेदनीयं यथोचितम् ॥ ४५ ॥
जन्मादिपञ्चवर्गे[131] तु तत्तत्तुङ्गावसानके[132] ।

131. D : वर्गैः

132. D : वसानकैः

Rule for the interruption of the base and stereobate[27]

45-46 In no case should the sage interrupt the stereobate (which tops the base). If the stereobate is interrupted for the sake of establishing a door, the door will be inauspicious but, if necessary, the *pādabandha* base

27. See above note 10. The rules given here may apply not only to doors but also to windows (cf. 16.67) or even to gargoyles (cf. *Śilparatna* quoted below). They appear in several texts:
—*Śilparatna* (20.129-31):

द्वारार्थं वा स्थलार्थं वा जलमार्गार्थमेव वा ।
जन्मादिपञ्चवर्गेषु तत्तदङ्गावसानके ॥
छेदनं नैव दोषाय पादबन्धतलेऽखिले ।
प्रतेश्छेदं न कर्तव्यं प्रतिबन्धकुले कदाचन ॥
जन्मच्छेदं न कर्तव्यं यत्रकुत्रापि सर्वतः ।
विपदामास्पदं ह्येतत् तस्मात्तन्नैव कारयेत् ॥

—*Īśānaśiva* (Kriyā. 31.101b-02a, about the doors of upper storeys):

सर्वत्र प्रत्युपरि द्वारं कुर्याद् विचक्षणः ।
प्रतिच्छेदेन तु द्वारं न कुर्वीत कदाचन ॥

—*Suprabhedāgama* (Kriyā. 31.33b-34 and 36-37a):

द्वारभेदं तथा शृणु ।
वृतेरूर्ध्वोत्तरान्तं यद् द्वारोत्सेधमुच्यते ।...
पद्मबन्धाद्यधिष्ठाने वृतेरुपरि निर्गमम् ॥
*वृतेरधस्तादुच्छेदं मसूरे पादबन्धके ।
अङ्गच्छेदं तु कर्तव्यमाङ्गं तु न कारयेत् ॥

(* *vṛti* = *prati*, see below 16.1).

—*Ajita* (12.37 and 44a):

द्वारोत्सेधमथोच्यते ।
प्रतेरुत्तरसीमान्तं द्वारोत्सेधं विधीयते ॥
प्रतिच्छेदविधानेन द्वारं *नैव प्रकल्पयेत् ।

(* text *caiva* is a printing mistake).

On a more practical point the rule seems to be followed at least on some monuments. J. Harle observes that the door of the entrance pavilion of Shore Temple at Mahabalipuram is above the base and that the same things may be seen on several Pallava monuments (e.g. Matangesvara or Mukteśvara temples at Kāñcīpuram) and he adds "the Pallava appear to have been reluctant to interrupt the mouldings of the base in order to accommodate steps" (*Temple gateways of South India*, 1963, p.12). Similar observation has been made in Cambodia: thus B.P. Groslier when restoring Prasat Bay Kaek, a small brick temple at Angkor, has observed that the stairway was just built against the mouldings of the base without them being interrupted; the steps placed in front of the false-doors on the upper storey of Prasat O Paong (Phnom Kulen) are placed similarly against the stereobate.

[133]सपट्टिकाङ्गेऽधिष्ठानेऽप्यन्यस्मिन्नेवमूह्यताम् ॥ ४५ ॥
यद् यत्रैवोचितं प्राज्ञस्तत् तत्रैव प्रयोजयेत् ॥ ४६½ ॥
[134]स्तम्भोच्चार्धं वा मसूरोच्चमानं
तत् षट्सप्ताष्टांशकं[135] भागहीनम् ।
वस्त्वाधारोच्चं भवेत् सर्ववस्तु-
ष्वेवं पूर्वं शम्भुना सम्यगुक्तम् ॥ ४७½ ॥

इति मयमते वस्तुशास्त्रे अधिष्ठानविधानो नाम
चतुर्दशोऽध्यायः

133. D : पट्टिकाङ्गेऽधिष्ठानेऽप्यन्तस्तस्मिन्नेवमूह्यताम्
134. E : शम्बच्चे
135. D : आंशतो

may be interrupted above any one of its five (main) mouldings from the plinth onwards.[28] This is not to be done however on a base comprising a stereobate.[29]

46 1/2 The wise man will place where prescribed that which is prescribed.

47 The height of the base is half that of the pillars or it is equal to half, less a sixth, seventh or eighth. Such is to be the height of the base for all types of buildings; it is precisely this that was prescribed by Śambhu in ancient times.

Thus ends, in the *Mayamata* treatise on dwelling,
the fourteenth chapter: RULES FOR BASES.

28. Cf. *Śilparatna* quoted in previous note. This means probably that in case a door interrupts a *pādabandha* base this must not happen in the middle of the height of one of the main mouldings (and in any case the plinth is not to be interruped, cf. *Śilparatna* 20.131). Aṭ present time *pañcavarga* is a normal designation of the base in Kerala, the five *varga* being the main mouldings of the more common type of base in this area: *pādukā* (first plinth), *jagatī* (main plinth), *kumuda* (torus), *gala* (groove or dado according to the size) and *prati* (upper string-course).

29. *Paṭṭikāṅga* = *prati*.

अथ पञ्चदशोऽध्यायः

[पादप्रमाणद्रव्यपरिग्रहविधानम्]

[स्तम्भलक्षणम्]

पादायामं सविस्तारमाकारं भूषणादिकम्[1] ।
[2]लक्षणान्तरतः सम्यग् वक्ष्ये संक्षेपतः[3] क्रमात् ॥ १ ॥
स्थाणुः स्थूणश्च[4] पादश्च जङ्घा च चरणोऽङ्घ्रिकः[5] ।
स्तम्भश्च तलिपः कम्पः[6] पर्यायवचनानि हि ॥ २ ॥

[स्तम्भमानम्]

[7]सवितस्त्यष्टहस्तोच्चं द्वादशक्ष्माद्यपादकम् ।
[8]तत्तद्वितस्तिहीनेन त्रिकरं[9] चान्त्यभूमिके ॥ ३ ॥
आत्तोत्सेधांशमानेन पादोच्चं[10] वा विधीयते ।
आत्ताधिष्ठानतुङ्गस्य द्विगुणं पादतुङ्गकम्[11] ॥ ४ ॥
द्विगुणादधिकोत्सेधः[12] स्तम्भः प्रोक्तः स्वयंभुवा[13] ।
अष्टविंशतिमात्रैस्तु मूलभूस्तम्भविस्तृतम् ॥ ५ ॥
[24]तत्तद्द्व्यङ्गुलभिन्नेन[15] षण्मात्रं चान्त्यभूमिके[16] ।
पादोच्चे पङ्क्तिनन्दाष्टभागेंऽशं पादविस्तृतम् ॥ ६ ॥

1. D : भूषणार्थकम्; E : भूषणान्वितम्
2. F : लक्षणान्तरितम्
3. D : संक्षेपेतं
4. E, F : स्थाणुश्च for स्थूणश्च
5. C : [अ] ङ्घ्रिकम्; D : [अ] ङ्घ्रिकैः
6. E : कुम्भः
7. A : ससेस्त्यष्टहस्तोच्चं; C : अर्धाधिकाष्टहस्तोच्चं
8. D : हस्तवितस्तिहीनेन
9. C : नवकं
10. D : पाद्विध्वं
11. F : तुङ्गता
12. D : -ओत्सेधात्
13. D : स्वयंभुना
14. E : omits 6.
15. D : हीनेन
16. D : स्यात् त्रिभूमिके

CHAPTER 15

DIMENSIONS OF PILLARS AND CHOICE OF MATERIALS

Pillars[1]

1 I now present, along the lines of the other treatises[2] but fully and in ordered fashion, the heights of the pillars, their diameter, form, decoration . . . etc.

2 *Sthāṇu*, *sthūṇa*, *pāda*, *jaṅghā*, *caraṇa*, *aṅghrika*, *stambha*, *talipa* and *kampa* are all synonymous (and designate pillars).[3]

Dimensions of the pillars

3-5a The ground floor pillars of a twelve storey building are eight and a half cubits high; by subtracting one span for each storey a height of three cubits is obtained for the pillars of the top storey. The height of a pillar may otherwise be calculated from a given height: it is double that of the corresponding base but the Svayambhū ordains that the height of a pillar be more than double that (of the base).[4]

1. Cf. *Mānasāra* (chapter 15), *Ajita* (chapter 14, Dagens 1984 pp.54-63), *Īśānaśiva* (Kriya. 31.19-74), *Śilparatna* (21.42 sq.) and G. Jouveau Dubreuil, *Dravidian Architecture,* 1917 [reprint 1972]. In this chapter *stambha* and its synonyms (cf. v. 2) designate pillars (or pilasters, see below); elsewhere in the text they are very often used as substitutes to *stambhavarga* (etc.) ('level of pillars', see chapter 14 note 9). Most of the prescriptions given here concern pillars as well as pilasters; in rare cases those last are specifically mentioned (see e.g. *kuḍyastambha,* v. 7).
2. *Lakṣaṇāntaratah*: "according to other (treatises dealing with the charasteristics (of pillars)".
3. For similar lists, see *Mānasāra* (15.4-6) and *Īśānaśiva* (Kriya. 31.19). *Kampa* is not, in the present case, the word which designates a kind of moulding (a 'fillet'), but a re-sanskritized form of Tamil term *kampam* (itself derived from skt. *skambha*!); it is not used in the sense of 'pillar' elsewhere than here and in 26.132 where is found the compound *kampadvāra* ('door attached to a pillar').
4. The *Svayambhū* is most probably the *Svayambhuvāgama,* one of the main canonical texts (*mūlāgama*) of the śaiva school; this is a very rare case of reference to a specific treatise. The proportions given here contradict those given in 14.16 and 47 (according to which the height of the base is to be less than half that of pillars.

[17]तदर्धं वा त्रिभागोनं[18] चतुर्भागोनमेव[19] वा ।
कुड्यस्तम्भस्य विस्तारस्तेन द्वित्रिचतुर्गुणः ॥ ७ ॥
पञ्चषड्गुण एवं स्याद्[20] भित्तिविष्कम्भ इष्यते ।
[21]जन्मोर्ध्वे स्तम्भविक्षेपहोमाः[22] स्तम्भविधौ विदुः ॥ ८ ॥

[स्तम्भभेदाः]

प्रतिस्तम्भः प्रतेरूर्ध्वे[23] चोत्तराधो हितायतिः ।
[24]जन्मोर्ध्वे स्तम्भनिक्षेपः स्तम्भायामस्त्रिभागभाक् ॥ ९ ॥
[25]गाम्भीर्यमवटं कृत्वा तदुपज्ञतलं[26] कुरु ।
[27]पादुकाद्युत्तरान्तस्थो निखातस्तम्भ इष्यते[28] ॥ १० ॥
[29]अधिष्ठानोत्तरान्तस्थो झषालस्तम्भ उच्यते[30] ।
तद्व्यासादर्कभागाद्यं[31] षड्भागोनाग्रविस्तरः ॥ ११ ॥
मूलभूस्तम्भतुङ्गस्य द्वादशाद्याः षडंशयुक्[32] ।
ऊर्ध्वोर्ध्वस्तम्भतुङ्गं स्यादेवं तद्विस्तरक्रमः ॥ १२ ॥

17. F : omits 7.
18. D : त्रिभागेन; E : त्रिभागं वा
19. D : भागेनमेव
20. D, E : वा
21. A : जन्मोर्धे; F : जनोर्धे
22. D et E : निक्षेपहोमाः
23. D : व्रतेरुर्ध्वे
24. A : जन्मोर्धे
25. C : गम्भीरमबटं कृत्वा तदुपर्यानतं कुरु ।
26. D : तदुपज्ञातरं
27. E : पादुकान्युत्तरान्तस्थो; F : पादुकादुत्तरान्तस्थो
28. F : उच्यते
29. C : omits 11a.
30. D : तुषालस्तम्भसिष्यते
31. A : भागाद्यु
32. D : षडंशकम्; F : पडंशकृत्

5b-8 The diameter of the ground floor pillars (of a twelve storey building) is twenty-eight digits; by subtracting two digits for each storey six digits are obtained (for the diameter of the pillars of) the top-storey. The diameter of a pillar may otherwise be one-tenth, one-ninth, or one-eighth of its height; that of the pilaster is half, two-thirds or three quarters (that of the pillar). It is said, as well, that the thickness of the wall is twice or three, four, five or six times (the diameter of the pilaster). It is said in the rule for pillars that the *homa* (?) which are above the plinth project all around the pillars (which rest on them)(?).[5]

Different types of pillars

9 The *pratistambha* rises from the stereobate'(which tops the base), up to the architrave. The part of the (*nikhāta*)-*stambha* above the plinth (of the base and below its summit) is equal to a third of the height of the pillar (?).[6]

10a After a deep excavation has been made the nature of the soil should be determined.[7]

10b-11a It is said that a 'pillar (whose bottom) is concealed' (*nikhāta-stambha*) rises from the plinth of the base up to the architrave. It is said that a *jhaṣālastambha* rises from the base up to the architrave.[8]

11b-12 The diameter of a pillar at its summit is from a sixth to a twelfth less than at its bottom. (It is also said) that the diameter of a ground floor pillar of a twelve storey building is a sixth of the height of that pillar and that the same relation exists between the height and the diameter of the pillars (of the) upper (storeys).

5. These pillars are probably *nikhātastambha* (below note 8). About *homa* see chapter 14 note 8.
6. If our interpretation is right, this implies that the base is higher than the level of pillars.
7. See chapters 4 and 14 (v. 2) but this half-verse seems to be out of place.
8. *Nikhātastambha*: the lower part of these pillars is sunk into the base of the building; it is the case of gateway pillars (see 24.29-31); door-jambs too seem to pertain to that category (cf. e.g. below chapter 30 v. 30b). According to Ganapati Sthapati *jhaṣālastambha* may be similar to those of the front veranda (poyal) of tamil houses which are often potbellied like fishes.

[33]अग्राकारं युगाश्रं तु कुम्भमण्डिसमन्वितम्[34] ।
ब्रह्मकान्तं तदष्टाश्रं विष्णुकान्तमिहोच्यते ॥ १३ ॥
[35]षडश्रमिन्द्रकान्तं स्यात् सौम्यं तत् षोडशाश्रकम् ।
कर्णमात्रेण तन्मूले चतुरश्रमितोर्ध्वतः[36] ॥ १४ ॥
अष्टाश्रं वा द्विरष्टाश्रवृत्तं पूर्वाश्रमीरितम्[37] ।
कुम्भमण्डियुतं[38] वाऽपि रुद्रकान्तं सुवृत्तकम् ॥ १५ ॥
विस्तारद्विगुणं मध्येऽष्टाश्रयुक्तं युगाश्रकम् ।
[39]वियुक्तं कुम्भमण्डिभ्यां मध्येऽष्टाश्रं तदुच्यते ॥ १६ ॥
चतुरष्टाश्रवृत्ताभं रुद्रच्छन्दं[40] समांशतः ।
दण्डाध्यर्धे द्विदण्डेनोत्तुङ्गद्विगुणविस्तृतम्[41] ॥ १७ ॥
पद्मासनं तु कर्तव्यं मूले पद्मासनं भवेत् ।
यथेष्टाकृतिसंयुक्तमूर्ध्वतो वा समण्डितम् ॥ १८ ॥
[42]चक्रवाकाकृतिव्याप्तं मूले पद्मासनान्वितम् ।
सभद्रं मध्यभागे तु भद्रकं तद् द्विमण्डितम्[43] ॥ १९ ॥
व्यालेभसिंहभूतादिमण्डितं यत्तु मूलतः ।
यथेष्टाकृतिसंयुक्तं तत्तन्नाम्ना समीरितम् ॥ २० ॥
[44]आत्तमेव तदायामे [45]शुण्डभेदसमन्वितम् ।
युतं तत् कुम्भमण्डिभ्यां[46] शुण्डपादमिति[47] स्मृतम् ॥ २१ ॥

33. E : omits 13-23.
34. D : संयुतम्
35. F : omits 14a.
36. C : इतोऽधरः
37. D : पूर्वाग्रमिष्यते
38. D : कुम्भमण्डयुतं
39. D : सुवृत्तं
40. A, C, F : रुद्रच्छन्द-; B : रुद्रच्छन्दः
41. D : विस्तृतम् for विस्तृतम्
42. D : omits 19-20.
43. C : द्विमण्डिकम्
44. D and F : वृत्तमेव
45. A : शुण्डु -; D : शुण्डि-
46. D : कुम्भमण्ड्याभ्यां
47. A : शुण्डुपादमिति; D : शुण्डिपादमिति

13-16 A pillar whose section is square (from) top (to bottom) and which is provided with a bell capital and an abacus is called *brahmakānta*;[9] if it is octagonal it is called *viṣṇu-kānta*;[10] if it is hexagonal it is called *indrakānta* and if it is sixteen sided, *saumya*. If a pillar is double section, square at the bottom and octagonal, sixteen sided or circular above, it is called *pūrvāśra* (but) it is called *rudrakānta* if it has a bell capital and an abacus and if it is completely circular.[11] If the median part is twice as high as it is wide and is octagonal section, if (the upper and lower parts) are square and if there is neither bell capital nor abacus it is referred to as a pillar 'octagonal in the middle'.

17a The *rudracchanda* pillar comprises three equal parts, one square, one octagonal and one circular.[12]

17b-19 The width of a lotiform base of pillar is one and a half or two modules or twice its height. The upper part (of a *bhadraka* pillar) is of whatsoever form desired or it comprises an abacus (and is) decorated with *cakravāka* (birds); it has a lotiform base at the bottom and projecting elements on its median part; this is a *bhadraka* (pillar) which has two abacus.[13]

20-22a A pillar which, no matter what the form of its upper part, is decorated from the bottom up with *vyāla* or elephants, lions, dwarves (etc. . . .),

9. *Kumbhamaṇḍisamanvita*: see v.30 and note *ad loc.* For the types of pillar described here see *Mānasāra* (15.20 sq.) and Dagens 1984 pp. 61.62 (descriptions of thirteen specific types according to *Ajita* 14.15b-32). A comparative chart of pillar types mentioned in agamic texts is given by N.R. Bhatt in his *Ajitāgama* edition (vol.1, between pp. 96 and 97).
10. According to *Ajita*, the drum of *viṣṇukānta* pillar may be octagonal or circular.
11. Its upper drum has a sixteen sided section according to *Ajita*; in the same text the *pūrvāgrastambha (Mayamata: pūrvāśra)* has a square base and a facetted circular drum.
12. That type of pillar comprises the Liṅga's three specific sections.
13. *Dvimaṇḍita*: the term *bhadra* is applied to any projecting element such as a forepart (e.g. 19.33) or a moulding. Here this projecting element is probably similar to an abacus (*maṇḍi*), hence the expression 'having two abacus'. It would have been possible to consider *dvimaṇḍita* as a mistake for *vimaṇḍita*; thus we would get here an alternative according to which the *bhadraka* pillar may be devoid of abacus; see however *Īśānaśiva* (Kriya. 31.24) where we find a similar expression in the description of a *bhadrakānta* pillar:

मूले पद्मासनश्चाथ चक्रवाकैरलङ्कृत ।
सभंद्रमध्यभागश्च भद्रकान्तो द्विमण्डिकः ॥

[48]मुक्तोत्करणकर्माङ्गं पिण्डिपादं तदेव हि ।
कर्मायामेन चाग्रे तु चतुरश्रसमन्वितम्[49] ॥ २२ ॥
[50]तदधस्त्वर्धदण्डेन पद्मं वस्वश्रसंयुतम् ।
तदधस्तु विकाराश्रं[51] दण्डेनाब्जं तु पूर्ववत् ॥ २३ ॥
[52]तदधो दण्डमानेन मध्यपट्टं[53] युगाश्रकम् ।
पद्मं च षोडशाश्रं च पूर्ववत् परिकल्पयेत् ॥ २४ ॥
[54]मूले शेषं युगाश्रं स्याच्चित्रखण्डं तदुच्यते ।
तदेवाष्टाश्रकं मध्यपट्टं[55] श्रीखण्डमुच्यते[56] ॥ २५ ॥
[57]मध्यपट्टं कलाश्रं चेच्छ्रीवज्र[58]स्तम्भमुच्यते ।
[59]अग्राकारं युगाश्रं स्यात् [60]त्रिपट्टक्षेपणान्वितम् ॥ २६ ॥
क्षेपणस्तम्भमित्युक्तं पट्टं पत्रादिशोभितम्[61] ।
ऊर्ध्वाधस्ताच्छिखामानं[62] त्रिचतुर्भागमेव वा ॥ २७ ॥
सर्वे पोतिकया[63] युक्ता[64] नानारूपैर्विचित्रिताः[65] ।

[दण्डलक्षणम्]

पादाग्रविपुलं यत्तु तद् दण्डमिति कथ्यते ॥ २८ ॥
[66]सर्वाण्यङ्गानि हर्म्याणां मानयेद्[67] दण्डमानतः ।

48. D : मुत्तो-
49. D : चतुरश्रसमं स्मृतम्
50. D : तदर्धं स्वर्धदण्डेन
51. D : शोडशाश्रं; C : विकारेण
52. E : ततो
53. D : मध्यपत्रं
54. D : मूलशेषं
55. D : मध्ये पट्टं
56. F : इष्यते
57. E : मध्येपट्टं; F : मध्यपट्टि
58. E : वर्ण- for वज्र-
59. F : अश्राकारं
60. D : त्रिपट्टं; F : त्रिपट्टे
61. A, D, F : पत्राद्विशोभितम्; E : भद्रादिशोभितम्; B : पत्रैर्विशोभितम्
62. D : मात्रं for मानं
63. D, E : वधिकया
64. D : युक्तं
65. C : नानारूपविचित्रिताः; D : नानारूपविचित्रितम्
66. A : सर्वाण्यङ्गानि; E : तत्तदङ्गानि
67. D : मापयेद्

bears the name of its decoration. Correspondingly then, that decorated throughout its height with protomes of elephants and which is provided with bell capital and abacus is called 'pillar with protomes' (*śuṇḍapāda*), that decorated with pearls throughout its height is called *piṇḍipāda*.

22b-26a A pillar of the *citrakhaṇḍa* type has a square element at the top two modules[14] high beneath which is an octagonal element with a doucine-like profile half a module high; beneath that again is a sixteen sided element one module high and next a (second) doucine profile, as above, then a square section median band one module high, then a (third) doucine profile and a (second) sixteen sided element as above; at the bottom, the remaining part of the height is occupied by a square element.[15] If the median band is octagonal section then the pillar is called *śrīkhaṇḍa* and if it is sixteen sided the pillar is called *śrīvajra*.

26b-27a If the upper part of the pillar is square section and if there is a projecting triple band the pillar is known as a *kṣepaṇastambha* and its triple band is decorated with leaves etc. . . .

27b At the summit and at the bottom of the pillar is a tenon a third or a quarter as wide (as the pillar).

28a All pillars are provided with a bracket capital and ornamented with various images.[16]

Definition of the module

28b-29a The module is the width of the top of the pillar and it is according to this module that all the measurements of every element of a building are to be taken.[17]

14. *Karṇāyāmena*: 'width two (standard) measures'; for the 'module' see below vv. 28b-29a.
15. That makes up a total of eight and half modules, which agrees with proportions given above (v. 7).
16. *Potikā*: see below vv. 39b sq.
17. See 5.8 for the different *daṇḍa* used in measurements.

[कलशलक्षणम्]

सपादं सार्धपादोनद्विगुणं द्विगुणोन्नतम् ॥ २९ ॥
श्रीकरं चन्द्रकान्तं[68] च सौमुख्यं प्रियदर्शनम् ।
यथाक्रमेण नामानि कलशानां[69] भवन्ति हि ॥ ३० ॥
[70]पोतिकाखण्डमण्डीनि कुम्भं स्कन्धं[71] च पद्मकम् ।
[72]मालास्थानं क्रमेणैव स्तम्भाग्रात्[73] परिकल्पयेत् ॥ ३१ ॥

68. D, F : रतिकान्तं
69. D : कलशानि
70. A, B, C : पोतिकाखण्डमध्यं च; D : बोधिकाखण्डिमण्डि च; E : बोधिकाखण्डमण्डञ्च; F : बोधिकाखण्डिमण्डि च
71. E : स्तम्भं
72. D : मालास्तानं; E : जलस्थानं
73. F : स्तम्भाग्रे

Bell capital

29b-30 Herewith, in order, the names of the (various) bell capitals (with their heights): *śrīkara* is one and a quarter (modules) high, *candrakānta* one and a half, *saumukhya* one and three quarters and *priyadarśana* one-half.[18]

31 Starting at the top of the pillar, there are successively: the bracket capital, the dye (featuring a human figure), the abacus, the bell capital, the support, the lotus and the band ornamented with garlands (*mālāsthāna*).[19]

18. The 'bell capital' is designated by terms whose first meaning is 'pot, vase' (*kumbha*, *kalaśa*) and which are applied to its main part (see below vv. 32 sq. and note 20). It is only a part of the crowning of pillar and its role is mainly decorative (like that of the abacus) as the main structural function is given to the *potikā* (below note 23). For its composition see below vv. 32-34a. According to *Ajita* (14.41-42) *śrīkara* bell capital is for circular or sixteen sided section pillars, *candrakānta* for octagonal ones, *saumukhya* for square one and *priyadarśana* for multifaceted ones (*atidhāra*).

19. Cf. *Īśānaśiva* (Kriyā. 31.60-61):

पोतिकाखण्डमण्डीनि कुम्भं लशुनमूल्कम्।
अम्भोजमालास्थानानि स्तम्भाग्रे योजयेत् क्रमात् ॥
अग्रहीनं तु लशुनं मूलोच्चं विपुलं भवेत् ॥

and *Śilparatna* 21.116-17:

बोधिकाखण्डमण्डीनि कुम्भं लशुनमूल्कम्।
अम्भोजमालां चानानि(?) पादपीठं पुनः क्रमात्
क्रमेण योजयेदग्रात् सर्वस्तम्भेषु बुद्धिमान्।
तत्र बोधिकया हीनं कारयेद् पादपीठकम् ॥·

For *potikā (bodhikā)*, *maṇḍi* and *kumbha*, see following notes. The *khaṇḍa* is most probably the element called elsewhere *vīrakaṇḍa* or *vīrakānta* (see v. 37 or 21.30, 33, 76, 82): it is a dye decorated with a human figure and which makes a recess between bracket capital and abacus. The support (*skandha* 'shoulder') is named in *Īśānasiva* 'garlic-bulb' (*laśuna*) which may indicate that it is wider at the base than at the top; it connects the bell-capital, above, and the 'lotus' , below. That last corresponds to the 'padmabandham' (according to Jouveau-Dubreuli terminology) and is a double row of lotus petals.

कुम्भोच्छ्रये नवांशे धृग्भागेन चतुरंशकैः ।
[74]कमलं कण्ठमंशेन भागेनास्यं प्रकीर्तितम्[75] ॥ ३२ ॥
भागेन पद्ममर्धेन[76] वृत्तमर्धेन हीरकौ[77] ।
[78]हीरौ पादसमव्यासौ[79] तत्कर्णेनास्यविस्तृतम्[80] ॥ ३३ ॥
तत्कर्णं कुम्भविस्तारं तत्कर्णं फलकायतम् ।
अथवा फलकायामं चतुर्दण्डं त्रिदण्डकम् ॥ ३४ ॥
सार्धत्रिदण्डमायाममुत्सेधाख्यं[81] त्रिदण्डकम्[82] ।
[83]तदुत्सेधे त्रिभागे तु भागेनोत्सन्धिरिष्यते ॥ ३५ ॥
भागेन वेत्रमंशेन पद्मं पाल्याभमिष्यते[84] ।
[85]नागवक्त्रसमाकारमावेत्रात्[86] पादरूपवत् ॥ ३६ ॥
पादविस्तारविस्तारं धृक्कण्ठं वीरकाण्डकम्[87] ।
सर्वेषामपि पादानां वीरकाण्डं[88] युगाश्रकम् ॥ ३७ ॥
तदुत्सेधत्रिपादोनं दण्डोत्थं[89] स्कन्धमिष्यते ।
तदधस्तु तदर्धेन पद्मं पत्रविचित्रितम्[90] ॥ ३८ ॥
मालास्थानमधस्तस्माद् दण्डमानसमुन्नतिः[91] ।

[पोतिका]

पादविस्तारविस्तारा[92] पोतिका[93] तत्समोदया[94] ॥ ३९ ॥

74. D : कलशं
75. D : प्रकल्पयेत्
76. D : पद्ममध्येन; E : पद्ममंशेन
77. D : हीनकौ; E : हीनकैः; F : भिरकौ
78. D and E : हीनौ; F : हीरौ
79. D : पादसमं व्यासौ
80. C : तत् कर्णोनास्यविस्तृतम्
81. D : उत्सेधं स्यात्; E : उत्सेधयास्यं
82. D : त्रिपादतः
83. D : तदुत्सेधं
84. D : पद्मवालुपमिष्यते
85. D : नागवृत्तसमाकारं वेत्रात् पादोनरूपवत्
86. E : वेत्रं
87. D : वीरकण्ढकम्
88. D : वीरकण्ढं
89. A : दण्डोद्धं; C : दण्डोऽर्धं; D, F : दण्डोच्चं
90. D, F : पद्मविचित्रितम्
91. D : दण्डमानं समुन्नतिः
92. D : विस्तारात्
93. D, E : बोधिका
94. C : तत्समोदयम्

32-34a The height of the bell capital[20] being divided into nine parts, the astragal takes up one part, the bell four, a groove one, a band with masks one, a doucine one, a reed half a one and the double *bīra* (?) half a one. The diameter of the double *bīra* is the same as that of the pillar and that of the band with masks is double that; the diameter of the bell is double (that of the pillar).

34b-39a The diameter of the abacus[21] is double (that of the pillar) or can be four, three and a half or three modules.[22] (The abacus) is three modules high and its height is divided into three (equal) parts: the upper connecting element occupies one, as do the reed and the inverted doucine; this abacus is in the form of a serpent's jaws; from the reed (downwards) its form is that of the pillar. The dye featuring a human figure is a support (?), its width is the same as that of the pillar and it is always square section no matter what the pillar. The support is a quarter the height of the dye (or may be) one module high; the doucine below it is half that height and the band ornamented with garlands is one module high and one module (wide) (?).

20. Descriptions of bell-capital given in the various treatises are most often muddled as appears in the following table where we have summarized those found in *Mayamata*, *Ajita* (14.34-36), *Dīptāgama* (5.23-24), *Īśānaśiva* (Kriyā. 31.51-53) and *Śilparatna* (21.79-80):

Mayamata	*Ajita*	*Dīptāgama*	*Īśānaśiva*	*Śilparatna*
dṛg 1/9	dṛg 1/9	dhṛg 1/9	dhṛg 1/9	dhṛg 1/9
kamala 4/9	kumbha 4/9	kalaśa 4/9	kumbha 4/9	ghaṭa 4/9
kaṇṭha 1/9	kaṇṭha 1/9	kaṇṭha 1/9	kaṇṭha 1/9	karṇa 1/9
āsya 1/9	āsya 1/9	āsya 1/9	mukha 1/9	mukha 1/9
padma 1/9	padma 1/9	padma 1/9	padma 1/9	padma 1/9
vṛtta 1/18	vṛtta-	vṛtta-	vṛtta 1/18	pīṭhikā 1/9
hīrakau 1/18	grīva 1/9	bhinnau 1/9	bhinnakau 1/18	

For a detailed commentary see Dagens 1984 p. 57.

21. *Maṇḍi:* see Dagens 1984 p. 58.

22. That is to say that the diameter of the abacus is two, three, and half or four times that of the pillar; cf. *Īśānaśiva* (Kriyā. 31.55b-56):

स्तम्भव्यासात् त्रिगुणितं चतुर्गुणमथापि वा ।
मण्ड्यायामः स्मृतोऽङ्घ्र्यग्रसमो वेष्वब्धिभागतः ॥
मण्ड्युत्सेधो भवेत् तावान् वीरकाण्डस्य चोच्छ्रयः ॥

[95]पञ्चदण्डसमायामा श्रेष्ठार्धोच्चा[96] कनिष्ठिका ।
[97]आयता सा त्रिदण्डेन चतुर्दण्डेन दीर्घका[98] ॥ ४० ॥
[99]त्रिभागोना त्रिपादोच्चा मध्यमा पोतिका[100] भवेत् ।
पूर्वोक्तं तत् समण्डीनां सकुम्भानां[101] चतुर्गुणम् ॥ ४१ ॥
[102]त्रिगुणं केवलानां तु पादानां प्रविधीयते ।
सर्वेषामपि पादानां[103] यथेष्टायतमीरितम् ॥ ४२ ॥
तदुच्चत्रिचतुर्भागोच्चा वा स्वाग्रे तु पट्टिका ।
अर्धं त्रिद्व्यंशमङ्घ्र्यूनं छायामानं[104] विधीयते ॥ ४३ ॥
त्रिभागं वा चतुर्भागं तरङ्गस्थानमिष्यते ।
सक्षुद्रक्षेपणं मध्यपट्टं[105] पत्रविचित्रितम् ॥ ४४ ॥
[106]समास्तरङ्गा[107]श्चान्योन्यहीनाः सर्वत्र सम्मताः ।
अग्रनिष्क्राममर्धं वा त्रिभागं वा स्वतारतः ॥ ४५ ॥
मुष्टिबन्धोपरिक्षिप्त[108] व्यालसंहतिरूपवत्[109] ।
सनालीकं समतलं सनाटकमथापि[110] वा ॥ ४६ ॥
[111]भूतेभमकरैर्व्यालसंयुक्तं चाग्रमण्डनम् ।
[112]पार्श्वयोः पोतिकामध्ये पट्टं पादविशालवत्[113] ॥ ४७ ॥

95. D : replaces 40-41 by:
पञ्चदण्डसमायामं श्रेष्ठं बोधिका भवेत् ।
आयतं स्यात् त्रिदण्डेन मध्योच्चकनिष्ठिका ॥
चतुर्दण्डेन दैर्घ्यं स्यात् विस्तारं पादपत्तति ।
त्रिभागेन द्विभागोच्चं मध्यया बोधिका भवेत् ॥
पूर्वोक्तं तत्समण्डीनां कुम्भानां च चतुर्गुणम् ।
फलकेन समायुक्तं चतुर्दण्डेन दैर्घ्यकम् ॥
त्रिभागोन त्रिभागोच्चं मध्यमा बधिका भवेत् ।
96. E : श्रेष्ठोर्ध्वं च
97. F : omits 40b-47b.
98. A : दिर्यका; C : दीर्घतः; E : दैर्घिका
99. E : त्रिभागोन त्रिभागोच्चा
100. E : बोधिका
101. A : सकुम्भा-
102. E : त्रिकोणं
103. D : देवानां
104. A : अङ्घ्ररुनं छायामानं; C : अनोन छायामानं
105. E : मध्यवर्गं
106. D : omits 45a.
107. A, C : तुरङ्गाश्च-
108. D : क्षिप्य for क्षिप्त-
109. D, E : व्यालसिंहादिरूपवत्
110. C : सनागकमथापि
111. D : भूतैर्मकरैर्व्यालैः संयुक्तं
112. D : द्विपार्श्वे बधिकामध्ये
113. All texts with the exception of D, place 47b between 46a and 46b.

Bracket capital[23]

39b-42 The bracket capital is the width of the pillar and is as high as wide; the largest is five modules long and half that high, the smallest three module long and the medium four module long with a height five twelth that (?). These measurements multiplied by four give (the total height) of pillars comprising an abacus and a bell-capital whilst, multiplied by three, they give the height of pillars lacking these elements. The selected height should be used for all the pillars (on any one storey of a building).

43-47 The top of the bracket capital[24] is a string-course a third or a quarter its height and whose overhang[25] is half, two-thirds or three quarters (its width). The height of that part of the bracket capital which is decorated with waves is a third or a quarter (that of the bracket capital); this element is provided with a median band, slightly projecting and decorated with foliage; the height of the waves is invariably constant but they grow progressively narrower (starting from the centre). (The element which is decorated with the waves) has, at its ends, a projection, half or one-third of its width, which is in the form of the tail of a *makara* and surmounts a fist-like decoration;[26] it may have (at both ends), a gargoyle or a *matala* (?) or a dancing figure and, at the top, a decoration of dwarves, elephants, *makara* or *vyāla*. The median band of the bracket capital is the same width on both sides of the pillar.

23. 'Bracket-capital' is a poor substitute for rendering *potikā* (or *bodhikā*); this elongated piece placed between the pillar and the entablature is that we may call a 'support for the entablature' as proposed by P. Stern (in *Colonnes indiennes d'Ajanta et d'Ellora*, 1972, p. 25). For detailed account on that element see Dagens 1984 p. 59-61.
24. *Śilparatna* (21.102-04) gives a slightly clearer description:
 बोधिकोच्चे त्रिभागे तु भूम्यंशेनोर्ध्वपट्टिका ।
 मध्येऽंशेन त्रङ्गः स्याल्लताद्यैर्भूषितं तु वा ॥
 तदधस्त्वेकभागेन मुष्टिबन्धं तु कारयेत् ।
 त्रिभागे बोधिकोत्सेधे सार्धांशेनाग्रपट्टिका ॥
 तदर्धार्धेन तदधः क्षेपच्छायान्वितं भवेत् ।
 तदुच्चार्धात् त्रिभागानामंशाभ्यां वात्र कल्पयेत् ॥
25. *Chāyāmāna*: 'the measure of the shadow';
26. *Muṣṭibandha*: these decorative elements shaped like balls or 'fists' (hence their name), are hanging from *potikā* ends or may be applied on a string-course or on the ends of the beams (see 16.10).

[114]रत्नबन्धक्रियावल्ली चित्रा [115]वाग्रस्थपट्टिका ।
[116]नानाचित्रैर्विचित्रा वा सा प्रोक्ता चित्रपोतिका[117] ॥ ४८ ॥
पत्रैर्विचित्रिता पत्रपोतिकेति[118] प्रकीर्तिता ।
महार्णवतरङ्गाभतरङ्गाभा[119] तरङ्गिणी ॥ ४९ ॥
[120]चतुःषडष्टपङ्क्त्यर्कसंख्या वा स्युस्तरङ्गकाः ।
बहवोऽपि समाश्चैते चान्योन्याः स्युर्वराः[121] क्रमात् ॥ ५० ॥

[स्तम्भविषये विशेषाः]

पादमर्धं त्रिपादं वा भित्तेः स्तम्भस्य[122] निर्गतम् ।
चतुरष्टाश्रवृत्तानां यथाक्रममिति स्मृतम्[123] ॥ ५१ ॥
[124]द्विहस्ताद्यं चतुर्हस्तं स्तम्भान्तरमिति स्मृतम् ।
[125]षडङ्गुलविवृद्ध्या तु नवभेदं[126] प्रकीर्तितम् ॥ ५२ ॥
गृहीतांशवशेनापि यथायुक्त्या प्रयोजयेत्[127] ।
[128]स्तम्भस्तम्भान्तरं सर्वं[129] प्रासादे सार्वदेशिके ॥ ५३ ॥
[130]विषमस्तम्भभागं तु [131]वास्तुवस्तुविनाशनम् ।
सायतं चापि तत्सर्वं तन्नाम्नैव[132] प्रपद्यते ॥ ५४ ॥
दारुस्तम्भविशालं वा सार्धं द्वित्रिगुणं तु वा[133] ।
शिलास्तम्भविशालं स्याद् देवानां नैव[134] मानवे ॥ ५५ ॥

114. A, B, C, D : रक्त-
115. A, B : वा ग्रन्थपट्टिका; D : वस्त्वग्रपट्टिका
116. D : नानाविचित्रचित्रं स्यात् तत् प्रोक्तं चित्रबोधिका
117. C : चित्रपट्टिका
118. D, E : बोधिकेति
119. E : तरङ्गाङ्ग-
120. D : चतुःषडष्टपङ्क्तर्क संख्यायाङ्गस्तरङ्गकाः
121. A, C : स्याद्वराः
122. D : तुङ्गस्य
123. D : उदीरितम् for इति स्मृतम्
124. A, C : द्विहस्ताद्या चतुर्हस्तात्
125. D : षट् षडङ्गुलवृद्धा वा
126. E : नवभागं
127. D : युक्त्यादि योजयेत्
128. D, E, F : समस्तम्भान्तरं
129. C : सम्यं
130. C : विषमं स्यादन्तरं तु
131. D, E : वस्तुवास्तु-
132. D : गणनन for तन्नाम्नैव
133. E : द्विगुणतुङ्गतः
134. D : रैव

48-50 (The bracket capital) is called *citrapotikā* if decorated with foliage and (garlands) of jewels or if its upper string-course is decorated in various colours; it is called *patrapotikā* if decorated with foliage. If it is decorated with waves like those of the Ocean it is then called *taraṅgiṇi*. These waves number four, six, eight, ten, twelve or even more; they are equal (in height) and become progressively wider (from the sides inwards).

Further features of pillars

51 According to whether (its section) is square, octagonal or circular a pilaster's projection[27] will be a quarter, a half or three quarters its width.

52-54 The intercolumniation should be from two to four cubits which, if six digits are added each time, gives nine possibilities.[28] After a suitable intercolumniation has been chosen it is to be used for all the pillars of any one building no matter what its type.[29] If the disposition of the pillars is irregular this will bring destruction upon the building and upon its site but, if the whole arrangement is true to the principle, success will ensue.

55-56 The diameter of a stone pillar is the same as that of a wooden one or may be half as much again or double; such a pillar is appropriate for buildings intended for gods but not for those intended for men. According to the ancients, the pillars may be (of) brick, stone or wood

27. *Bhitteḥ stambhasya nirgamam*: or 'the projection of the pillar from the wall', however the corresponding passage in *Īśānaśiva* (Kriyā. 31.33b-34a) does not favour that interpretation:

पादमर्धं त्रिभागं च भित्तिस्तम्भविनिर्गमम् ।
चतुरश्राष्टवृत्तानां विज्ञेयस्तु क्रमाद् भवेत् ॥

28. For intercolumniation in pavilions see 25.13 sq.

29. *Prāsāde sārvadeśike* (see 15.59, 20.6, 24.77, etc.). This expression may refer to the so-called 'geographical' classification of building (*nāgara, drāviḍa, vesara*,... etc.); cf. 19.35 sq. and note *ad loc.*

[135]इष्टकाश्मद्रुमैः सर्वैः स्तम्भाः प्रोक्ताश्चिरन्तनैः ।
युग्मायुग्मं तु देवानामयुग्मं तु नृणां मतम्[136] ॥ ५६ ॥
अन्तःस्तम्भं बहिःस्तम्भमाजुसूत्रं यथा भवेत्[137] ।
[138]गृहाणां भित्तिमध्ये तु शालानां तु तथा भवेत् ॥ ५७ ॥
प्रासादानां तु पाद्बाह्ये पान्मध्ये शयनासने ।
[139]उपानादिशिरः[140] केचित् केचित् स्तूप्यन्तमुन्नतम् ॥ ५८ ॥
मुनयः प्रवदन्त्युच्चं प्रासादे सार्वदेशिके ।
पाद्बाह्ये पादमध्ये वा सभामण्डपयोर्मतम्[141] ॥ ५९ ॥
अन्तर्बहिश्च मध्ये तु सालानां मानसूत्रकम् ।
[142]युञ्जीयादेवमेवं तु सर्वेषां सम्पदां पदम् ॥ ६० ॥
विपरीते विपत्त्यै[143] स्यादिति शास्त्रविनिश्चयः[144] ।

[द्रव्यपरिग्रहः]

स्तम्भोत्तरादिकाङ्गानां द्रव्यं[145] द्रुमोपलेष्टकाः ॥ ६१ ॥

[वृक्षलक्षणम्]

स्निग्धसारमहासारा [146]ह्यवृद्धास्तरुणेतराः ।
[147]अवक्रा निर्व्रणाः सर्वे ग्रहीतव्या महीरुहाः ॥ ६२ ॥
[148]पुण्याद्रिवनतीर्थस्था दर्शनीया मनोरमाः ।
सर्वसम्पत्समृद्ध्यर्था[149] भवेयुस्ते न संशयः ॥ ६३ ॥

135. D : omits 56; F : omits 56-68a.
136. C : भवेत् for मतम्
137. E : यथा तथा
138. D : गृहामभित्रमध्ये
139. D : उपनादिशिरः केचित् स्तूप्यन्तञ्चमुदं विदुः
140. E : उपानाजिशिरः
141. E : स्मृतम् for मतम्
142. C : युञ्जीत देवदेवं
143. D : विपद्ये
144. D : शास्त्रस्य निश्चयम्
145. D : द्रव्यात्
146. D : वृद्धञ्च for ह्यवृद्धास्
147. D : अकरा
148. D : पुण्यभूवनतीर्थं स्याद् दुर्गातिर्वा मनोरमा
149. D : समृद्धिस्स्यात्

but should be homogeneous[30] (in any one building) and their number, which may be either even or odd for gods, must be odd for men.

57-58a The measuring line[31] goes along the inside or the outside of the row of pillars (which surrounds the building) but, in houses or *śālā*, it is along the median axis and in temples exterior to their pillars and, in bedrooms, on their axis (?).

58b-59a According to some sages the height of a building of any type is measured from the plinth (of the base) to the roof but, according to others, it is measured from plinth to finial.[32]

59b-61a In assembly halls and pavilions the measuring line goes along the axis of pillars or along their exterior, but it should go along the interior, the exterior or the median axis of (enclosure) walls; whichever the case this is a source of good fortune but failure is certain if there is any deviation from the rules, as is affirmed by the treatises.

Choice of building materials[33]

61b Wood, stone and brick are the materials to be used for (vertical) elements such as pillars and (horizontal) elements such as architraves.

Trees

62-63 The chosen trees must be perfect, hard and vigorous; they should neither be old nor should they be saplings; they should not be crooked and should be undamaged; they should be growing in a holy place, mountain, wood or river-bank and they should be pleasing to eye and to mind. It is a certainty that such trees are conducive to prosperity and good fortune.

30. Literally: 'all (pillars) are in bricks, stones or wood'.
31. *Ājusūtra* (and below v. 60: *mānasūtra*): see 6.19b sq. and note *ad loc*. About the position of that line see also 21.21, 22.79-81, 23.17, 25.195 . . .
32. This verse seems to be out of place as it interrupts the statement on measuring line position.
33. On that subject also see 18.92 (coatings and mortars), 18.164 (woods suitable for making the finial axis), 25.182 (woods for pavilions), 33.4 sq. (stones for making Linga). cf. Dagens 1984 pp. 20-29.

पुरुषः खदिरः सालो मधूकः चम्पकस्तथा[150] ।
शिंशपार्जुनाजकर्णी क्षीरिणी[151] पद्मचन्दनौ[152] ॥ ६४ ॥
पिशितो धन्वनः पिण्डी सिंहो राजादनः शमी ।
[153]तिलकश्च द्रुमाश्चैते स्तम्भवृक्षाः समीरिताः ॥ ६५ ॥
[154]निम्बासनशिरीषाश्च एकः[155] कालश्च कट्फलः ।
[156]तिमिसो लिकुचश्चैव पनसः सप्तपर्णकः ॥ ६६ ॥
[157]भौमा चैव गवाक्षी चेत्यादयश्चोर्ध्वभूरुहाः ।

[शिलालक्षणम्]

[158]एकवर्णाः स्थिराः स्निग्धाः सुखसंस्पर्शनान्विताः ॥ ६७ ॥
प्राचीनाश्चाप्युदीचीना भूमग्नाः[159] शुभदाः शिलाः ।

[इष्टकालक्षणम्]

स्त्रीलिङ्गाश्चापि पुल्लिङ्गा निर्दोषाश्च नपुंसकाः ॥ ६८ ॥
[160]सुघनाः समदग्धाश्च [161]सुस्वराश्चेष्टकाः शुभाः ।
स्त्रीलिङ्गाश्चापि पुल्लिङ्गा भिन्नच्छिद्रादिवर्जिताः ॥ ६९ ॥
एतैरेवंविधैर्द्रव्यैः कृतं[162] वस्तु समृद्धये[163] ।
धर्मार्थकामसौख्यानां[164] भवेदेवेति निश्चितम्[165] ॥ ७० ॥

150. A, C : स्तम्बकस्तथा; B : स्तबकस्तथा
151. E : कण्टकी
152. C : पद्मचन्दनाः
153. D : किलकश्च
154. D : निम्वासनिश्चीर्षवाकादलकश्च कक्षत्फलाम्
155. E : शाकः
156. A, C : किमिसो
157. D : होमश्चैव; E : हेमश्चैव
158. D : एकवर्णासनास्निग्धा
159. D : भूमन्ताः
160. D : निश्शेषसुखनासं दग्धाश्चसुसुखश्चेषका [gap]-भाः
161. E : सुस्वना-; F : स्वस्वरा-
162. D : कृत- instead of कृतं
163. C : समृद्धिभत्
164. C : मोक्षानां instead of सौख्यानां
165. D and E : निश्चयः

64-67a Herewith the trees suitable for the shafts of pillars: *puruṣa*, *khadira*, *śāla*, *madhūka*, *campaka*, *śiṃśapa*, *arjuna*, *ajakarṇin*, *kṣīriṇī*, *padma*, *candana*, *piśita*, *dhanvana*, *piṇḍī*, *siṃha*, *rājādana*, *śamī* and *tilaka*. Equally suitable are *nimba*, *āsana*, *śirīṣa*, *eka*, *kāla*, *kaṭphala*, *timisa*, *likuca*, *panasa*, *saptaparṇaka*, *bhaumā* (?) and *gavākṣīn*.

Stone[34]

67b-68a Suitable stones are of even colour and are hard, perfect, pleasing to the touch and are embedded in the earth with an eastward or northward orientation.

Bricks

68b-70 Bricks are female, male or neuter[35] and must be without flaw, compact and uniformly baked; they should, as well, give off an harmonious sound. Male, female and neuter bricks must be free from fissures (?) and cracks. It is well-known that a building constructed out of such materials is conducive to the growth of Dharma, Artha and Kāma.

34. For more detailed accounts see 33.4 sq. or *Śilparatna* 14.1.44.
35. See 12.105-6.

[वर्ज्या वृक्षाः]

न देवतालयान्तस्थाः प्रहता वा न विद्युता[166] ।
[167]न दावानलसंलीढा न भूतालयमध्यगाः ॥ ७१ ॥
न महापथ[168] संरूढा न तु ग्रामसमुद्भवाः ।
[169]न घटाम्बुभिरासिक्ता न पक्षिमृगसेविताः ॥ ७२ ॥
न वायुना न मातङ्गैर्भग्ना नैव गतासवः[170] ।
[171]न चण्डालजनाकीर्णा न सर्वजनसेविताः ॥ ७३ ॥
नान्योन्यवलिता[172] भग्ना न वल्मीकसमाश्रिताः ।
[173]न लतालिङ्गिता गाढा न सिराकोटरावृताः ॥ ७४ ॥
नाङ्कुरावृतसर्वाङ्गा न भृङ्गकीटदूषिताः[174] ।
[175]नाकालफलिनो ग्राह्या न श्मशानसमीपगाः[176] ॥ ७५ ॥
[177]सभाचैत्यसमीपस्था देवादीनां न भूरुहाः ।
[178]वापीकूपतटाकादिवस्तुष्वपि[179] च सम्भवाः[180] ॥ ७६ ॥
[181]विनष्टवस्तुसञ्जातद्रव्यं सर्वविपत्करम् ।
तस्मात् सर्वप्रयत्नेन शुद्धं द्रव्यं[182] प्रगृह्यताम् ॥ ७७ ॥
शिला देवालये ग्राह्या द्विजावनिपयोर्मताः[183] ।
[184]पाषण्डिनां च कर्तव्या न कुर्याद् वैश्यशूद्रयोः ॥ ७८ ॥

166. D : प्रभुता वा विद्युता
167. D : वनदावानलसंलीढा
168. D : पद्म- for पथ-
169. D : त न for न
170. C : स्वभावतः
171. D : चण्डालवाजनाकीर्णो
172. D : फलिता for वलिता
173. E : न वीनलिङ्गता
174. A, B, E, F : भृशं कीटदूषिताः; C : भृषं कीटभूषिताः
175. D : न कालफलिनो
176. D : समीपके
177. F : omits 76a.
178. D : omits 76b.
179. E : वास्तुष्वपि
180. C : भभवाः
181. D : विनिष्टवस्तु यत् पूर्वं शल्यं सर्वविपत्करम्
182. C and D : शुद्धद्रव्यं
183. D : द्विजा वा नृपयेर्मताः; F : द्विजावनिचयोकृतः
184. D, E, F : तापसानां

Trees to be avoided

71-76 The (chosen) trees should not be close to temple and should not have been struck by lightning nor scorched by any conflagration; they should not be growing in a place inhabited by spirits nor beside a major roadway nor in a village and they should not have been sprinkled with the water from the ritual (and thus be objects of cult worship); they should not be frequented by birds nor by wild animals nor should they have been bent by wind nor by elephants; they should not be dead nor be serving as shelter for caṇḍāla nor for men of any caste whatsoever; they should not be entangled with each other nor should they be twisted; they should not harbour white ants nor be strangled by liana nor be bound; they should not be hollow nor have empty veins (?), there should be no twigs whatsoever on their branches; they must not have been damaged by wild bees nor by worms nor should they bear fruit out of season; they should not be propped up and should not grow near a cemetery nor assembly hall nor holy ground; they must not belong to any god or deity nor should they be found near a tank, well, pond or like place.

77 Materials from a forbidden locality give rise to all sorts of misfortune and the correct materials should therefore be chosen with the utmost care.

78-79a Stones should be used for temples and for the dwellings of brahmins and of the king as well as for heterodox (shrines) but they are

कर्तव्यं यदि तद् वास्तु[185] धर्मकामार्थनाशकृत्[186] ।
एकद्रव्यकृतं शुद्धं मिश्रं द्विद्रव्यनिर्मितम्[187] ॥ ७९ ॥
[188]त्रिद्रव्यसंयुतं यत्तु तत् सङ्कीर्णमुदाहृतम् ।
[189]पूर्वोदितानां वासेषु कर्तव्यं सम्पदां पदम् ॥ ८० ॥

[वृक्षसंग्रहणम्]

सर्वद्वारिकनक्षत्रे शुभपक्षमुहूर्तके ।
गच्छेदरण्यं द्रव्यार्थी[190] कृतकौतुकमङ्गलः ॥ ८१ ॥
निमित्तैः शकुनैर्योग्यैः सह[191] मङ्गलशब्दकैः ।
गन्धैः पुष्पैश्च धूपैश्च[192] मांसेन कृसरेण च[193] ॥ ८२ ॥
पायसौदनमत्स्यैश्च भक्षैश्चापि[194] पृथग्विधैः ।
अर्चयेदीप्सितान् सर्वान् वृक्षांश्च वनदेवताः॥ ८३ ॥
भूतक्रूरबलिं दत्त्वा कर्मयोग्यद्रुमं हरेत्[195] ।
मूलाग्रादार्जवं वृत्तं[196] शाखानेकसमन्वितम् ॥ ८४ ॥
[197]तत्तु पुंस्त्वं भवेन्मूले स्थूलं स्त्रीत्वं कृशाग्रकम् ।
स्थूलाग्रं कृशमूलं तु षण्डमेतदुदीरितम्[198] ॥ ८५ ॥
मुहूर्तस्तम्भमुद्दिश्य पुंभूरुह उदीरितः[199] ।
[200]सर्वेष्वङ्गेषु वस्तूनां[201] पुंस्त्रीषण्डं प्रकीर्तितम् ॥ ८६ ॥
पूर्वाशायां द्रुमस्यास्य स्वपेद्[202] दर्भान्तरे शुचिः ।
[203]स्वप्रदक्षिणपार्श्वे तु संस्थाप्य परशुं सुधीः ॥ ८७ ॥

185. D, E : मोहेन instead of तद् वस्तु
186. F : नाशनम्
187. D : द्विद्रव्यसंयुतम्
188. D : निर्मितत्रसंयुक्तं संकीर्णं तत् प्रकीर्तितम्
189. D : पूर्वोदितानि सर्वेषु
190. D : द्रव्यार्थं; E : द्रव्यानां
191. D : सर्व-
192. F : मत्स्यैश्च instead of धूपैश्च
193. D : मांसैश्च रुधिरेण वा
194. D : हविश्चापि instead of भक्षैश्चापि
195. A, C, E, F : वरैः ; D : खनेत्
196. E : विप्रं; F : कृत्वा
197. D : तत् पुंस्त्वं भवेत् स्त्रीत्वं मूलस्थूलं कृशाग्रकम्
198. D, E : उदाहृतम्
199. D, F : उदाहृतम्
200. D : सर्वेष्वङ्गेषु या पुंसि पुंस्त्रीषण्डा प्रकीर्तिताः
201. E : वास्तूनां
202. E : श्वभ्रे for स्वपेद्
203. D, E, F : स्वप्रदक्षिणपार्श्वे तु परशुं ग्राह्य बुद्धिमान् ।

inappropriate for vaiśya and śūdra and such a building so constructed will bring about the disappearance of Dharma, Artha and Kāma.

79b-80 A building constructed out of only one material is said to be 'pure' whilst with two materials it is called 'mixed' and with three, 'mingled'. Success emanates from houses built according to the above mentioned principles.

Search for trees[36]

81-82a One who wishes to look for materials should go into a forest, under a constellation favourable to the enterprise and during a bright fortnight; he must previously have accomplished the solemn preliminary rites and it is essential that the portents and omens be auspicious and that sounds of good omen accompany him (on his expedition).[37]

82b-83 To begin with, the chosen trees are to be propitiated, as also the forest deities, with the aid of perfumes, flowers and fumigations and with offerings of meat, boiled rice with sesame, rice with water and fish and with food of all kinds.

84-86 Once bloody offerings have been made to the Spirits, the tree suitable for the (projected) work should be selected. A tree which is straight, cylindrical from root to top and which has plenty of branches is called 'male' whereas it is 'female' when broad at the bottom and thin at the top, and neuter when it is broad at the top and thin at the bottom. A tree intended for a *muhūrtastambha*[38] should be male, but male, female and neuter trees are suitable for every part of a building.

87-88 The architect, purified and wise, is to spend the night on a spread of *darbha* to the east of the tree having first placed his axe beside him to the right. Then in the morning, after drinking pure water and facing to

36. The ceremony described here is very similar to that prescribed for the making of the pole for the god's banner (*dhvajadaṇḍa*); cf. e.g. *Rauravāgama* Kriyā. 18.22 sq.

37. The list of good and bad omens is given in *Ajita* (5.2-14).

38. On that pillar placed above the foundation-deposit see below vv. 104b sq. and 27.66 sq.

पीत्वा शुद्धं पयो रात्रावपराभिमुखोऽपरः[204] ।
स्थपतिर्वरवेषाढ्यो मन्त्रयेत् सपरश्वधः[205] ॥ ८८ ॥
अयं मन्त्रः —
अपक्रामन्तु भूतानि देवताश्च सगुह्यकाः[206] ।
[207]युष्मभ्यं तु बलं भूयः[208] सोमो दिशतु पादपाः! ॥ ८९ ॥
शिवमस्तु महीपुत्रा ! देवताश्च सगुह्यकाः ! ।
[209]कर्मैतत् साधयिष्यामि क्रियतां वासपर्ययः ॥ ९० ॥
[210]एवमुक्त्वा नमस्कृत्य पादपेभ्यो नमः शुचिः ।
[211]दुग्धतैलघृतैः सम्यक् सन्तेज्य[212] परशोर्मुखम्[213] ॥ ९१ ॥
उपक्रामेत्तु तं छेत्तुं यथाकामं वनस्पतिम् ।
[214]मूले हस्तं व्यपोह्योर्ध्वे त्रिश्छित्वा तत्र लक्षयेत्[215] ॥ ९२ ॥
वारिस्रावो विवृद्ध्यर्थः क्षीरं पुत्रविवर्धनम्[216] ।
[217]शोणितं स्वामिनं हन्याद् वर्जयेत् तं प्रयत्नतः ॥ ९३ ॥
पतने सिंहशार्दूलहस्तिशब्दाः सुशोभनाः[218] ।
[219]रुदितं हसितं कोशं[220] कूजितं निन्दितं वरैः[221] ॥ ९४ ॥
[222]पातयेदुत्तराग्रं तु पूर्वाग्रं वा वनस्पतिम् ।
ते दिशौ शुभदे[223] स्यातामन्याशासु[224] विपर्यये ॥ ९५ ॥

204. E : वरः for [अ]परः
205. A, B, C, D : सपरश्वथः
206. D : सरक्षसान्
207. E : omits 89b-90a.
208. D : बलिं भूयात्
209. D : किमेतत्
210. D : एवमुक्तान्
211. F : द्रव्य-
212. C : संमृज्य; D : संत्यज्य; E : संशोद्ध्य
213. E : परशोर्मुवम्
214. D : मूले हस्ते; E : मूलहस्तं
215. E : लक्षणम्
216. D : पुत्रवर्धनम्
217. D : शोणितं स्वामिनाशं स्याद्
218. D : शब्दैस्तु शोभनम्
219. F : रुद्रकं हस्तकं
220. C : क्रोशः
221. D : रुदितं परैः
222. D : पतने
223. D : शुभदौ
224. C : अन्यास्तु सुर्

the west, the perfect architect, clad in white and with axe in hand, pronounces this formula:

89-90 Herewith the formula: "Let Spirits, Divinities and Demons disperse! On you O trees let Soma bestow power! May It be propitious for you O sons of Earth! Divinities and Demons I shall accomplish this act and you must change your dwelling place."

91-93 The pure architect, having done this and having paid homage to the tree, whets the edge of the axe suitably with milk, oil and ghee[39] and then embarks upon the cutting down of the selected tree. Having left one cubit at the base, he knocks three times and begins his examination; if water flows out this will bring about an increase in fortune and if milk-white sap (the house owner) will have many sons but if there is blood-red sap this will mean the death of the owner (of the house) and the greatest care should be taken to avoid such a tree.

94 If the cries of lions, tigers or elephants are heard at the moment when the tree falls this is a good omen but the sages condemn tears, laughter, shrieks and whispers (heard at that moment).

95-98 It is auspicious that the tree should fall to the north or the east and it augurs badly if the fall is to any other direction. It is lucky if it falls onto *sāla*, *aśmari* or *ajakarṇin* trees but if the tree falls upside down[40] this will cause the death of the relatives and servants (of the householder).

39. According to *Īśānaśiva* (Kriyā. 33.24) this is done with *pañcagavya*.
40. Literally: 'if the root falls above the top'.

[225]सालाश्मर्यजकर्णीनामूर्ध्वे तु पतनं[226] शुभम् ।
[227]मूले पृष्ठागमे बन्धुप्रेष्ययोश्च विनाशनम् ॥ ९६ ॥
[228]निर्गमत्स्थितिमद् भूत्वा वृक्षान्तरनिपातने ।
शिरःसङ्गेन नाशः[229] स्यान्मूल[230] सङ्गे श्रमो भवेत् ॥ ९७ ॥
शरीरभङ्गं कर्तॄणां नाशमग्रेऽप्यपत्यहृत्[231] ।
[232]अन्योन्यपतनं पूज्यं छेद्यं चोभयतः समम् ॥ ९८ ॥
[233]चतुरश्रमृजुं कृत्वा मुहूर्तस्तम्भसंग्रहे । ।
सितपट्टेन सञ्छाद्य स्यन्दने न्यस्य वेशयेत्[234] ॥ ९९ ॥
देवद्विजमहीपानां विशां वै शकटेन तु ।
शूद्रस्य पुरुषस्कन्धेनानीयात्तु विचक्षणः ॥ १०० ॥
पार्श्वयोः शाययित्वा[235] तु शकटे न्यस्य[236] वेशयेत् ।
प्रशस्ते द्वारि प्रग्राह्य स्थपत्यनुगतद्रुमम्[237] ॥ १०१ ॥
[238]कर्ममण्डपके न्यस्य बालुकोपरि शाययेत्[239] ।
[240]प्रागग्रं चोत्तराग्रं वाप्याशुष्कं रक्षयेत् पुनः ॥ १०२ ॥
परावृत्तं न कर्तव्यमाषण्मासं तु स द्रुमः[241] ।
[242]सर्वेन्द्रकीला एवं स्युः[243] प्रापणीयाः[244] प्रयत्नतः ॥ १०३ ॥
[245]अन्येषामपि कुप्यानां[246] वेशने त्वग्रमग्रतः ।

225. D : शालाकर्याजकर्णीनां
226. C : ऊर्ध्वाग्रपतनं
227. D : adds between 96a and 96b. सालमत्स्वा-जकर्णं पनसं चम्पकं तथा ।
228. D : निर्गम्य स्थितिं भूत्वा वृषान्तरे तु पातने
229. D : नाशं
230. D : मूलं
231. D : त्वपत्युनम्
232. D : अन्ये तत् पतनं
233. D : ऋजुकृत्वाग्रचतुश्रमुहूर्तस्तम्भसङ्ग्रहे ।
234. E : स्यन्दनैः स्थाप्य वेशनम्
235. E : साधयित्वा
236. D : शकटेनास्य
237. D : स्थपत्यानुगतद्रुमम्
238. D : धर्ममण्डपके
239. D : शाधयेत्; E : धापयेत्
240. D : प्राक् शिरश्चोत्तराग्रं वा शुष्कं रक्षयेत् ततः
241. D : तद् द्रुमम्
242. All texts place 103b-104a after v.100.
243. D : सर्वेषामपि कीला स्युः
244. E : प्रापणीयात्
245. D : एवमन्येऽपि क्रय्यानां वेशयेत् पूर्वमग्रतः ।
246. F : रूपानां

If, by falling amongst surrounding trees, the tree remains in place once cut this presages death, if it is held back at the top, and illness, if it is held back at the bottom. If the trunk of the tree is broken this heralds the death of the wood-cutter and if its top is broken this will mean the disappearance of his line; preparation must thus be made for the fall of the tree, at its top and its base (?).

99-100 The tree is to be cut at both its extremities and, if a *muhūrtastambha* is wanted, it is squared off then covered with white cloth and hoisted onto a litter. The well advised man will, however, have it transported by chariot if it is intended for a god, a brahmin, a king or a vaiśya though for a śūdra he will have it carried on a man's back.

101-102 The tree is laid on its side and then hoisted into the chariot. Once the tree selected by the architect has been taken into the workshop through the door prescribed, it is installed by being drawn up onto the sand with its top towards the east or the north.[41] The tree is to be kept without being moved for six months, until it is dry.[42]

103-104a In the same way all the nails should be stowed away with great care along with the other metal pieces and all these things should point in the same direction (?).[43]

41. Thus the orientation of the tree in the workshop is to be the same than that of its fall in the forest (cf. v. 95).
42. According to *Īśānaśiva* (Krīya. 33.34) the tree is to be kept for three, five or eight months. For the sake of comparison we may add that, nowadays in Europe, hard woods are to be kept for one year by centimetre of thickness and soft woods for six months.
43. Cf. *Mānasāra* 15.340.

[मुहूर्तस्तम्भः]

मुहूर्तस्तम्भो देवानां द्विजातीनां [247]यथाक्रमम् ॥ १०४ ॥
[248]कार्तमालश्च खदिरः खादिरश्च मधूककः ।
[249]राजादनो यथासंख्य विस्तारायाममुच्यते ॥ १०५ ॥ ।
भानुरुद्रदशद्वारवितस्त्यायामसंयुताः[250] ।
तत्संख्याङ्गुलिविस्तीर्णाः[251] पङ्क्त्यंशोनाग्रविस्तराः ॥ १०६ ॥
भूतसार्धचतुर्वेदगुणतालनिखातकाः[252] ।
भूमिभूमिवशादुक्तं[253] स्तम्भोच्चं विपुलं तु वा[254] ॥ १०७ ॥
झषालाङ्घ्रौ तु सर्वत्र निखातं परिवर्जयेत् ।
अश्वत्थोदुम्बरश्चैव प्लक्षश्च वटवृक्षकः ॥ १०८ ॥
सप्तपर्णश्च बिल्वश्च पलाशः कुटजस्तथा[255] ।
[256]पीलुः श्लेष्मातकी लोध्रः कदम्बः पारिजातकः ॥ १०९ ॥
शिरीषः कोविदारश्च तिन्त्रिणीको महाद्रुमः ।
शिलीन्ध्रः सर्पमारश्च शल्मली सरलस्तथा[257] ॥ ११० ॥
किंशुकश्चारिमेदश्चाभयाक्षा[258] मलकद्रुमाः ।
कपित्थः कण्टकश्चैव[259] पुत्रजीवश्च डुण्डुकः ॥ १११ ॥
[260]कारस्करः करञ्जश्च [261]वरणश्चाश्वमारकः ।
बदरो वकुलः पिण्डी पद्मकस्तिलकस्तथा[262] ॥ ११२ ॥

247. C, D : द्विजादीनां
248. D : काञ्चमालश्च खदिरं खादिरं च मधूककम्
249. C : राजाटनो; D : राजाटनं
250. D : सहिता
251. D : आङ्गुलविस्तीर्णा
252. D : गुणतापङ्क्तिखातका
253. C, D : उक्त
254. F : क्रमात् instead of तु वा
255. A, C, F : कुटचस्तथा; E : कुटशस्तथा
256. E : बिल्वं
257. E : सनलस्तथा; F : सुरभुस्तथा
258. C : च हयाक्षा-; D : च गयाक्षा-
259. D : कर्णिकश्चैव; E : कण्टकोवृक्ष-
260. C : पारस्कारः
261. F : वरुण-
262. D : मुकुलस्थलकस्तथा

104b-108 These are the other trees which may be used for *muhūrtastambha*, for the gods as well as for the higher castes: *kārtamāla*, *khadira*, *khādira*, *madhūka* and *rājādana*. Herewith the figures for the dimensions (of the *muhūrtastambha*), the height and diameter: the height is twelve, eleven, ten or nine spans and the diameter that same number of digits although, at the summit, this diameter is less by one-tenth; the concealed part (at the bottom) is five, four and a half, four or three spans. The heights and widths prescribed above and calculated according to the number of storeys may also be used. In the case of a *jhaṣālāṅghri* the bottom of the pillar should never be hidden.[44]

109-114 *Aśvattha*, *udumbara*, *plakṣa*, *vaṭavṛkṣa*, *saptaparṇa*, *bilva*, *palāśa*, *kuṭaja*, *pīlu*, *śleṣmātakin*, *lodhra*, *kadamba*, *pārijātaka*, *śirīṣa*, *kovidāra*, *tintriṇīka*, *mahādruma* (?), *śilīndhra*, *sarpamāra*, *śalmalī*, *sarala*, *kiṃsúka*, *arimeda*, *abhaya*, *akṣa*, *amalàka*, *kapittha*, *kaṇṭaka*, *putrajīva*, *ḍuṇḍuka*, *kāraskara*, *karañja*, *varaṇa*, *aśvamāraka*,

44. That kind of pillar rests upon the base (see above vv. 10-11).

पाटल्यगरुकर्पूरा न ग्राह्या[263] गृहकर्मणि ।
देवयोग्या इमे सर्वे मानुषाणामनर्थदाः ॥ ११३ ॥
तस्मात् सर्वप्रयत्नेन गृह्णीयान्न नरालये[264] ।

[इष्टकासंग्रहणम्]

ऊषरं पाण्डुरं[265] कृष्णचिक्कणं ताम्रपुल्लकम्[266] ॥ ११४ ॥
[267]मृदश्चतस्त्रस्तास्वेव गृह्णीयात् ताम्रपुल्लकम् ।
अशर्कराश्ममूलास्थिलोष्टं सतनुवालुकम् ॥ ११५ ॥
एकवर्णं सुखस्पर्शमिष्टं लोष्टेष्टकादिषु ।
मृत्खण्डं पूरयेदग्रे[268] जानुदघ्ने जले ततः ॥ ११६ ॥
[269]आलोड्य मर्दयेत् पद्भ्यां[270] चत्वारिंशत् पुनः पुनः ।
[271]क्षीरद्रुमकदम्बाम्राभयाक्ष[272]त्वग्जलैरपि[273] ॥ ११७ ॥
त्रिफलाम्बुभिरासिक्त्वा[274] मर्दयेन्मासमात्रकम् ।
[275]चतुष्पञ्चशडष्टाभिर्मात्रैस्तद्द्विगुणायताः ॥ ११८ ॥
व्यासार्धार्धत्रिभागैकतीव्रा मध्ये परेऽपरे[276] ।
[277]इष्टका बहुशः शोष्याः समदग्धाः पुनश्च ताः ॥ ११९ ॥

263. A, B : कर्पूरावग्राह्यौ; D : कर्पूरा न गृह्या; F : कर्पूरावग्राह्या
264. D : न तद् ग्राह्या नरालये
265. E : पाण्डरं
266. E : ताम्रपुंलिकम्
267. D : ततश्चतश्रभिस्तस्वेव
268. D : पूरयेच्छुभ्रं
269. E : आलोक; F : अलक्य
270. E : सद्यः
271. E : क्षीराम्रम-
272. C : हयाक्ष-
273, D : जलेनापि
274. C : आसिच्य; D : असिक्ता
275. D : चतुष्पञ्चषडष्टाभिमत्रि व्यायासाद्विरायता
276. D : तीव्रमर्धेपरेवरे
277. D : इष्टकं

badara, *vakula*, *piṇḍin*, *padmaka*, *tilaka*, *pāṭali*, *agaru* and *karpūra*, these trees must not be used in constructing houses for, though they are all proper to gods, they bring misfortune to men; care should therefore be taken to avoid using them in human dwellings.

The making of bricks

115-116a Salty, off-white, black and uniform, red and swollen, these are the four kinds of earth from which red and swollen earth should be taken.[45] Earth suitable for making bricks, tiles . . . etc.[46] will be free from gravel, pebbles, roots and bones and will be mixed with white sand; its colour will be homogeneous and it will be pleasing to the touch.

116b-119 Clods of earth are put into a knee-deep hole filled with water then, when (the earth and water) have been mixed, this mixture should be crushed by foot and without a pause, forty consecutive times; next it is soaked in the sap of *kṣīra*, *kadamba*, *amra*, *abhaya*, *akṣa* and the three myrobolans[47] and kneaded three times, after which the bricks are fashioned. These bricks are four, five, six or eight digits wide and twice as long as wide, their thickness in the middle, as at both ends, is a quarter or a third their width.[48] Once they are completely dry these bricks are baked in the usual manner.[49]

45. Cf. *Īśānaśiva* (Kriyā.33.36):

 चिक्कणा पाण्डराख्या च सलोणा च विगर्हिता ।
 चतुर्थी ताम्रफुल्ला तु कर्मयोगा मृदिष्यते ॥

46. *Loṣṭba* ('tile':) cf. 18.46, 104; *Śilparatna* (14.119-148) and *Īśānaśiva* (Kriyā. 33.45-51) give lists of different kinds of tile, together with the specific use they are intended for.
47. These vegetal binders are also used for making coatings and mortars (18.192 sq.).
48. Such bricks are 'male' (cf. 12.105-07).
49. Brick drying and baking methods are described in *Īśānaśiva* (Kriyā. 33.41-44).

एकद्वित्रिचतुर्मासमतीत्यैव विचक्षणः[278] ।
[279]जले प्रक्षिप्य यत्नेन जलादुद्धृत्य तत् पुनः ॥ १२० ॥
[280]निरार्द्रास्ताः प्रयोक्तव्या इष्टका इष्टकर्मणि ॥ १२०½ ॥
एवं द्रुमेष्टकशिला विधिना गृहीत्वा
कुर्वन्तु वस्तु[281] विहिता हि वराः समृद्ध्यै ।
यन्निन्दितं त्वपरवस्त्ववशिष्ट[282]माद्यै-
र्द्रव्यं विनष्टभवनप्रभवं[283] विपत्त्यै ॥ १२१½ ॥
[284]स्तम्भायामं तारमाकारभेदं
सालङ्कारं भूषणं च क्रमेण ।
[285]युक्त्या युक्तं सम्पदामास्पदं तत्
प्रोक्तं नृणां तैतिलानां मयेह[286] ॥ १२२½ ॥
इति मयमते वस्तुशास्त्रे पादप्रमाणद्रव्यपरिग्रहो नाम
पञ्चदशोऽध्यायः

278. E : विचक्षणैः
279. E : जलैः
280. E : निरप्रस्ताप्रयोक्तव्या
281. E : पूर्वं तु यस्तु
282. D : अविशिष्ट- instead of अवशिष्ट-
283. C : भवने प्रभवेत्
284. F : स्तम्भाकारन्तारम्
285. D : युक्ता युक्तं
286. D : अथेह; E : मयेन

120 Subsequently, when one, two, three or four months have gone by, the knowledgeable man immerses the bricks carefully in water and then takes them out; those which are not damp when they come out are to be used for a brick construction.[50]

121 After the wood, bricks and stones have been chosen according to these principles, the sages in charge of the construction will erect a building which will be a success but the use of any prescribed material or of any material taken from another building will, say the ancients, cause the ruin of the building and will bring misfortune.[51]

Thus ends, in the *Mayamata*, treatise on dwelling, the fifteenth chapter: DIMENSIONS OF PILLARS AND CHOICE OF MATERIALS.

50. *Nirārdra*: this seems to be an empirical method to ascertain if bricks are porous enough to allow a good grip of the mortar.
51. In spite of such injunctions the re-use of old materials is very frequent in temple building or renovation.

अथ षोडशोऽध्यायः

[प्रस्तरकरणम्]

उत्तरादिवृतेरन्तं[1] [2]प्रस्तारावयवं क्रमात् ।
संवक्ष्ये क्षिप्य सर्वेषां हर्म्याणामथ[3] योग्यकम् ॥ १ ॥

[उत्तरवाजनौ]

[4]उत्तरं त्रिविधं पादविस्तारं तत्समोद्गमम्[5] ।
त्रिपादोदयमध्योच्चं[6] विस्तारं पादतः समम्[7] ॥ २ ॥
खण्डोत्तरं पत्रबन्धं रूपोत्तरमिति त्रिधा ।
[8]त्रिपादं वा त्रिभागोनमर्धं वा[9] कर्णनिर्गमम्[10] ॥ ३ ॥

1. D, F : व्रतेरन्तं; E : प्रतेरन्तं
2. D, E, F : प्रस्तर- instead of प्रस्तार- (passim)
3. E : मर्त्यानामथ
4. D : adds between verses 1 and 2 :
   अथ सर्वेषां हर्म्याणां योग्यं प्रस्तरवस्यकम् ।
   उत्तरादि प्रतेरन्तं वयवं वक्ष्यति क्रमात् ॥
   अथ सर्वेषां हर्म्याणां प्रस्तरमुत्तरोर्ध्वतः ।
   प्रतेरन्तमवयवं क्रमात् संक्षिप्य वक्ष्यते ॥
5. B, F : तत्समोदयम्
6. F : अर्धोच्चं
7. E : विस्तारात् पादतत् समम्
8. D, E : त्रिभागं
9. D : अथ वा for अर्धं वा
10. F : कर्मनिर्गमम्

CHAPTER 16

ENTABLATURE[1]

1 I now describe the components of the entablature, suitable for all types of building, starting from its architrave up to its frieze.[2]

The architrave and its upper fascia[3]

2-3 There are three kinds of architrave: the *khaṇḍottara* type whose width is equal to that of the pillar[4] and which is as high as wide, the *patrabandha* type whose height is three quarters of its width and the *rūpottara* type the height of which is half the width; the width (of the last two types) is equal to that of the pillar. The projection (of the

1. *Prastara* (also *mañca*): the term is applied to the entablature as well as to the ceiling which is at the same level. This chapter deals with both of those elements which make interpretation somewhat uneasy. Cf. *Īśānaśiva* (Kriyā. 31.75-102), *Mānasāra* (chapter 16), *Tantrasamuccaya* (2.43 sq.), *Śilparatna* (chapters 29 and 30), *Kāmika* (I. chapter 54), *Ajita* (14.47-58,37.31-36). See Dagens 1984 pp. 63-64. This chapter also deals with windows, walls and other miscellaneous subjects (vv. 49-66).
2. Cf. *Mānasāra* 16.17: उत्तरादिप्रदेशान्तं सर्वेषां प्रस्तरोदयम्।
   or *Kāmika* (1.54.1-2):
   अथ वक्ष्ये विशेषेण प्रस्तरस्य विधिक्रमम्।
   उत्तरं वाजनश्चैव मुष्टिबन्धं मृणालिकाम्॥
   दण्डिकावलयक्षुद्रगोपानाच्छादनानि च।
   अलिङ्गान्तरिता चैव प्रत्यङ्गं वाजनं क्रमात्॥
   For the detailed list of entablature components according to *Ajita* see Dagens 1984 p. 63. The 'frieze', described in vv. 29 sq., looks like a decorated string-course topped by a fillet; it is designated in this chapter by various terms (*vṛti, prati, vedī, vedikā*, cf. *pradeśa* in *Mānasāra*) all of which may be also applied to the stereobate (see chapter 14 notes 10 and 27).
3. *Uttara* may be applied to the architrave as well as any horizontal beam (cf. Tam. *uttiram*); *vājana* is generally applied to a small flat moulding topping an ensemble.
4. That is to say to one module (see above 15.28).

स्वस्तिकं वर्धमानं[11] च नन्द्यावर्तसमाकृतिः ।
[12]सर्वतोभद्रवृत्तिर्वा[13] प्रत्युत्तरनिवेशनम् ॥ ४ ॥
त्रिभागैकं चतुर्भागं वाजनं निर्गमोद्गमम् ।
चतुरश्रं सपर्णाग्रं[14] तदूर्ध्वे मुष्टिबन्धनम् ॥ ५ ॥
[15]तुलाच्छेदेन वा कुर्यात् पृथग्वा वाजनोपरि ।
[16]स्तम्भार्धविपुलं स्वार्धं तीव्रं[17] पट्टाम्बुजक्रियम्[18] ॥ ६ ॥
सनालिकमधस्तात् तु वाजनाद्[19] दण्डनिर्गमम् ।

[प्रमालिका]

मूलाग्रयोः शिखोपेता तदूर्ध्वे तु प्रमालिका[20] ॥ ७ ॥
[21]स्तम्भव्याससमोच्चा वा त्रिचतुर्भागतीव्रका[22] ।
कुम्भमण्डियुताग्रा[23] च हस्तिमुण्डक[24]सन्निभा ॥ ८ ॥

[दण्डिका]

दण्डिकासमनिष्क्रान्ता[25] तदूर्ध्वे दण्डिका भवेत् ।
स्तम्भार्धविपुला स्वार्धतीव्रा[26] नीव्रार्धनिष्क्रमा[27] ॥ ९ ॥
[28]मुष्टिबन्धसमाकारचतुरश्रा यथा[29] तथा[30] ।

11. F : बन्धमानं
12. D : सर्वतोभद्रवृत्तं वा सन्धिप्रत्युन्निवेशनम्
13. E : वृत्याय; F : वृत्तं वा
14. D, E : सपद्याग्रं; F : सपत्याग्रं
15. D : omits 6a.
16. D : भागार्धं
17. D : सार्धं नाव्रं; E : सार्धतीव्रं
18. C : पट्टाम्बुजक्रमम्
19. E : वाजनं
20. D, E, F : मृणालिका
21. D : स्तम्भस्य ह्येवमोच्चं
22. C : तीव्रता; D : निद्रकम्
23. F : -आश्रा for आग्रा
24. D : हरितमण्डि-; E : हरिततुण्ड-
25. D : सविनिष्क्रान्ता
26. D : सार्धनीव्रा; E : सार्धतीव्रा
27. C : तीव्रार्धनिष्क्रमा
28. E : omits verse 10.
29. D : चतुरश्रायता
30. F : भवेत्

architrave) at the corners is three quarters, half or a quarter its width (?).[5]

4 The disposition (of the components), from architrave to frieze (*parti*), is called *svastika*, *vardhamāna*, 'in *nandyāvarta* form' or *sarvatobhadravṛtti*.[6]

5-7a The height and projection of the architrave's upper fascia are a third or a quarter (of the height of the architrave) and its upper part is decorated with foliage. Above is the 'fist-mouldings', cut out from the (ends of the) beams or made up separately on the top of the upper fascia; they form a string-course (decorated with protruding) lotuses;[7] it is half a module high and has a projection half as great as its height; it has a gargoyle lower down which projects by one module in relation to the upper fascia.

The braces[8]

7b-9a Above this, are the braces provided with tenons at top and bottom; their height is one module and their diameter a quarter or a third their height; they are topped by a bell-capital and an abacus; they are curved like an elephant's trunk and they project as much as do the consoles.

5. As *karṇa* and *kaṇṭha* are often muddled up in grantha manuscripts *karṇanirgaṇa* is perhaps to be emended in *kaṇṭhanirgama*; in that case the meaning would be "the projection (of the entablature) from the attic" (for *kaṇṭha* = 'attic' cf. Dagens 1984 pp. 45-46).
6. These categories do not appear elsewhere in the text.
7. *Muṣṭibandha* can also be found hanging from the extremities of bracket-capital (15.46); here, they are applied on vertical surfaces such as beam ends or a kind of string-course placed at the top of upper-fascia; they appear to be lotus shaped (cf.v. 11b: *kṣepaṇāmbuja*). However the description given here is not clear.
8. *Pramālikā* (*mṛṇālikā* in some manuscripts and in 18.5-6): these 'braces' seems to play a role similar to that of the 'struts' described afterward (*kāyapāda*, below v. 16); they must be oblique pieces connecting the top of the architrave (or its upper fascia, see below v. 13) and the consoles (which support the cornice) while the struts seem to support the rim of the cornice. They look like dwarf pillars with a shaft curved like a lotus stem (hence *mṛṇālikā*) or an elephant trunk while the 'struts' are straight.

[वलयं, गोपानश्च]

[31]यथेष्टविपुलोत्तुङ्गं तत्तुङ्गसमवेशनम् ॥ १० ॥
[32]वलयं स्यात् तदूर्ध्वे तु गोपानं वा तदूर्ध्वतः ।
मुष्टिबन्धविशालोच्चा पट्टिकाक्षेपणाम्बुजा[33] ॥ ११ ॥
[34]छित्त्वार्पितावशिष्टा तु दण्डिकोपरि पट्टिका ।
[35]तस्यां छित्त्वा तु तन्मानं गोपानं चार्पयेद्[36] बुधः ॥ १२ ॥
[37]उत्तरान्तावलम्बं[38] वा यथायुक्ति यथारुचि ।
वाजनोर्ध्वे तुलोर्ध्वे वा गोपानं योजयेद् बुधः ॥ १३ ॥
तुलान्तरसमं गोपानान्तरं प्रविधीयते ।
गोपानदण्डिकोर्ध्वं चेद्[39] वाजनान्तावलम्बनम् ॥ १४ ॥
दण्डार्धविपुलं स्वार्धं तीव्रं[40] गोपानमूर्ध्वतः ।
कम्पं समान्तरं कुर्याद् वलयच्छिद्रमन्तरे[41] ॥ १५ ॥

31. F : omits 10a.
32. E : वलयस्य तदूर्ध्वं तु गोपानं या तदूर्ध्वतः
33. E : पट्टिकाक्षेपणान्वितम्
34. E : चित्रार्पिता-; F : श्रुत्वापि
35. C : तस्या कृत्वा; D : तस्मात् वाशेदितं
36. D : शोभनं चार्पयेद्; E : गोपनं स्वार्पयेद्
37. D : omits verse 13.
38. E : उत्तरार्धावलम्बं
39. D : -ओर्ध्वाच्च; E : ओर्ध्वे तु
40. D : सार्धं नीव्रं; E : सार्धं नीव्र
41. D, E : वलयञ्चित्रमन्तरे

The consoles[9]

9b-10a The consoles are next above this; their width is equal to one module, their thickness to a quarter of (their width) and their projection is half that of the rim (of the cornice); they resemble the ('fists' of the) fist-moulding unless they are square section.

Lierne and cornice

10b-11a Above these is either the lierne or the cornice.[10] The height and the width of the lierne vary according to circumstances and its thickness is proportional to its height.

11b-12 There is a band whose height is to be equal to the width of fist-mouldings; once protruding lotuses[11] have been cut out (on it), the remaining parts (between the lotuses?) are to be arranged on the consoles. On the top of it the sage should arrange the cornice, cut to the right dimensions.

13 The sage so disposes the cornice that its overhang extends down to the level of the top of the architrave or, if the particular circumstance and appearance so dictate, to the top of the upper fascia or to just above the beams.

14 It is said that the distance between the (rim of the cornice) and the wall is the same as that between (the wall) and the extremities of the beams. If the cornice is just above the consoles its overhang extends down to the upper fascia.

15 The width of the cornice is half a module and its thickness half that width(?). Its sloping dwarf-rafters[12] are to be regularly spaced and are to be provided with an inside hole for the lierne.

9. *Daṇḍikā*: those consoles hold up the cornice (which looks like the overhang of a roof or like a lean-to), or the roof when they are on the attic (18.5 sq.).
10. According to *Kāmika* (quoted above note 2), 'lierne' (*valaya*) and 'cornice' (or 'dripstone', *gopāna*) are to be used simultaneously, which seems more logical than the alternative proposed by *Mayamata*: the lierne is an horizontal piece connecting the small rafters of the cornice and both elements are complementary.
11. *Kṣepaṇāmbuja*: cf. note 7.
12. The cornice is to be made up like the overhanging lower part of a roof. Those dwarf-rafters (*kampa*) correspond to the lower part of the rafters (*lupā*) described in chapter 18.

[कायपादम्]

[42]दण्डिकावाजनान्तस्थं कायपादं यथांशकम् ।
पादविस्तारमर्धार्धनिष्क्रान्तं साग्रपट्टिकम्[43] ॥ १६ ॥
पादानामन्तरं छाद्यं[44] फलकैः सारदारुजैः[45] ।
[46]अष्टांशबहलं [47]छन्नफलकाच्छाद्यमूर्ध्वतः ॥ १७ ॥
[48]गोपानस्योपरिष्टात्तु च्छादयेल्लोहलोष्टकैः ।
[49]कपोतपालिकोत्सेधनिष्क्रान्तं द्वित्रिदण्डकम् ॥ १८ ॥
एकहस्तं द्विहस्तं वा क्षुद्रे महति मन्दिरे ।
यथाशोभं यथाचित्रं कपोते[50] कर्णपालिका ॥ १९ ॥
तथा मध्यस्थिता वाऽपि[51] सौधे शैले समाहिता ।

[वाजनम्]

विधेया वाजनस्योर्ध्वे भूतहंसादिकावलिः[52] ॥ २० ॥
[53]दण्डोच्चा वा त्रिपादोच्चा वाजनं पूर्ववद् भवेत् ।
कपोतालम्बनं तत् स्याद्[54] दण्डार्धं वाऽथ दण्डकम् ॥ २१ ॥
अध्यर्धादित्रिदण्डान्तं [55]कपोतोच्चविनिर्गतम् ।
[56]वसन्तकं वा निद्रा वा विधेया[57] वाजनोपरि ॥ २२ ॥
त्रिपादोच्चा तदूर्ध्वं[58] स्यात् कपोतोच्चं तु पूर्ववत् ।

42. D : omits 16a.
43. C : सार्धपट्टिकम्; F : स्थाग्रपट्टिकम्
44. D, F : चाद्यं
45. D : सरदरुजैः; E : सारदरुकैः
46. C : अष्टांशबहुलं
47. F : छिन्न-
48. D : गोपनस्याष्टलोष्टान्तु छादयेल्लोहलष्टकैः
49. A : कपोलपालिको-; F : कपोतापशको
50. D : कपोता
51. D : पाली; F : पालं
52. A : हंसादिकावलम्
53. E : दण्डे सार्धत्रिपादोच्चा
54. E, F : तस्माद् for तत् स्याद्
55. D : कपोतश्च
56. D : वसन्तं कम्पा नीद्रा
57. A : विधेवा
58. D, E : तदूर्ध्वे

The struts

16 The struts,[13] the proportions of which are given here, should be placed between the consoles and the upper fascia. They are as wide as the pillars and their projection is a quarter (of their width); there is a band at their summit.

17-18a The intervals between the struts are to be closed by planks in hard woods.[14] The sloping cover above is made up of planks with a thickness equal to an eighth (of a module?); above the cornice however there should be a roofing of metal or bricks.

18b-20a (Or else) the cornice (may be decorated) with foliage,[15] its height and projection being of two or three modules or of one or two cubits according to whether it is for a large or a small building. In order to give a pleasing appearance the foliage decoration is put at the corners on (the extrados of) the cornice or else it is placed in the centre; it is set into the stone or into the stucco coating.

The upper fascia (cont.)

20b-22a Above the upper fascia there may be a frieze of dwarves, *haṃsa*. . . etc.; it is one module or three quarters of a module high and the upper fascia is as above. The overhang of the cornice (extends) to that (frieze) or is one module or half a module. The projection and the height of the cornice are (then) from one and a half to three modules.

13. *Kāyapāda*: this word appears to be a hybrid compound made up from Tam. *kai* ('rafter') and Skt. *pāda* ('pillar'), *kai* becoming *kāya* by sanskritization and the compound literal meaning is 'pillar (holding) rafter'. Those struts appear to be stronger than the 'braces' mentioned above (see 16.7 and note *ad loc.*).
14. Let us remind that, here as elsewhere, the architectural description mixes wooden architecture and its *decorative* representation on stone or brick structures. Thus the arrangement described here may be that of a wooden building or the same one rendered by sculpture on a stone or brick one.
15. *Kapotapālikā*: the *pālikās* are generally low-relief decorations applied to the corners of the extrados of the dripstone and between them (e.g. J. Harle, *Temple Gateways of South India*, 1963, pl. 95).

[कपोतम्]

[59]एवं स्याद् दृढकल्प्यं तच्छिलयेष्टकमात्रकैः ॥ २३ ॥
यथाप्रयोगं स्थैर्यं तु तथा[60] योज्यं विचक्षणैः ।
[61]कपोतोच्चत्रिभागं वा पादं वा क्षुद्रनिष्कृतिः[62] ॥ २४ ॥
कपोते नासिका क्षुद्रे नीव्रोर्ध्वे[63] स्थितकर्णिका[64] ।
[65]सपाददण्डा वाध्यर्धं[66] द्विदण्डं विस्तृता स्थिता[67] ॥ २५ ॥
[68]सिंहश्रोत्रशिखालिङ्गं पट्टिकान्तस्य पट्टिका ।
[69]विधेया स्वस्तिकाकृत्या नासिकोर्ध्वे तु नासिका ॥ २६ ॥
कुक्षिमानं शिखामानं[70] यथाशोभनमेव वा[71] ।
प्रतिवाजनकस्योर्ध्वे नेष्यते[72] नासिकोच्छ्रयम् ॥ २७ ॥

[प्रस्तरोर्ध्वभागम्]

[73]आलिङ्गं पादपादोच्चं पादात् पादविनिर्गतम् ।
[74]तस्मादन्तरितं चोर्ध्वे निष्क्रान्तावेशनक्रियम् ॥ २८ ॥
त्रिपट्टाग्रं हि पादोच्चं पादे पादान्तरे स्थितम् ।
[75]दण्डं त्रिपादमर्धं वा प्रत्युत्सेधं तदूर्ध्वतः ॥ २९ ॥

59. D, E : एवं स्याद् दृढकल्पं तु शिलायेष्टकयाद्दुमम्
60. D : यथा
61. D : कपोतोच्चं
62. D : क्षुद्रनीव्रकम्; E : क्षिप्रनीव्रकम्
63. A : नीव्रोर्ध्वं; C : नीव्रोर्ध्वस्
64. D : स्थितपोतिका
65. E : द्विपाददण्डपार्धार्धद्विदण्डं विस्तृतान्विता
66. D : पादार्धं
67. D : विस्तृतान्वितम्
68. D : omits 26.
69. E : विधेया स्वरितयुक्तानासिकोर्ध्वेन नासिका ।
70. A, B, C : यथामानं
71. D, E, F : add between 27a and 27b: वाताहतवलश्चारुलतावत् कर्णका त्रिधा ।
72. D : नेष्यन्ते
73. E : अलिंङ्ग वाधिपादौ
74. D : omits 28b-29a.
75. C : मूलेऽन्तक्रमार्धं वा प्रत्युत्सेधं तदूर्ध्वतः

22b-23a (Or else) a *vasantaka* (?) or a *nidrā* (?) may also be arranged above the upper fascia;[16] their height is three quarters (that of the fascia) and the height of the cornice above is as already given.

The cornice (cont.)

23b-24a (The cornice) is thus to be made solid; the sages should arrange it so that it is sturdy as to its materials, stone or brick, and according to the particular circumstances.

24b-27 The projection of the eave of the cornice(?) is a third or a quarter the height of the cornice.[17] On the cornice the false dormer-windows rise (like) *karṇikā* above the edge of the rim;[18] they are a module and a quarter, a module and a half or two modules wide and high; their top, which is in the form of a lion's ear, rises up to the fillet or to the frieze or to the top part of the frieze; they must be in *svastika* form(?) and a false dormer-window ought to be above a false dormerwindow.[19] The proportions of their hollow part and of their tip may also be in accordance with the appearance required. These false dormer-windows must not rise above the upper part of the frieze.

Top of the entablature

28-29a (Above the cornice) there is a fillet of which the height is a quarter of a module (?) and the projection (also) a quarter of a module (?); above there is a groove of which the recess is equal to the projection (of the fillet).[20] A triple band at the top is as high as a pillar and stands on and between the pillars (?).

16. *Vasantaka, nīdra*: we do not know what they are; they appear in the same context in *Īśānaśiva* (Kriyā. 31.87) and in *Kāraṇāgama* (I.7.47).
17. *Kṣudra*: we suppose that it is the small projecting band appearing normally at the bottom of the curved extrados of the cornice.
18. *Nāsikā*: about false-dormer windows (the so-called *kūḍu*) see below 19.18-19a and note *ad loc. Sthitakarṇikā*: according to 18.73 *karṇikā* are 'like beautiful creepers agitated by the wind' (*vātābatacalaccarārulatāvat*).
19. That probably means that the position of the false dormer-windows are to be the same on all the entablatures of a multiple-storeyed building.
20. The two terms *āliṅga* ('fillet') and *antarita* ('groove') are most often used together (cf. Dagens 1984 p. 46).

[76]स्वोच्चत्रिपाद[77]निष्क्रान्ता प्रतिरर्धेन वा तथा ।
[78]दण्डः सपादः सार्धो वा प्रतिवक्त्रं विनिर्गमः ॥ ३० ॥
[79]तावदूर्ध्वोद्गतिस्तस्याः प्रागुक्तविधिना कुरु[80] ।
सव्याला वा ससिंहेभा ऋज्वी वा स्यात् प्रतेः कृतिः[81] ॥ ३१ ॥
तदुच्चत्रिचतुर्भागं वाजनं निर्गमोद्गमम् ।
समकरं चित्रखण्डं नागवक्त्रमिति त्रिधा[82] ॥ ३२ ॥
[83]नागवक्त्रं[84] नागफणं स्वस्त्याकृतिशिरःक्रियम्[85] ।
तैतिलानां द्विजातीनां[86] भवेत् समकरा[87] प्रतिः ॥ ३३ ॥
[88]चतुरश्रं तु खण्डाग्रं मकरं चित्रखण्डकम् ।
नृपाणां वणिजां शूद्रजन्मनामर्धचन्द्रकम् ॥ ३४ ॥
[89]हस्तिरूपं भवेन्मुण्डं प्रत्यग्रं[90] चित्रसन्निभम् ।
[91]ककरं कर्कटं बन्धमन्य[92] दप्येवमूह्यताम् ॥ ३५ ॥

[तुलादिबन्धम्]

वाजनोर्ध्वे वलीकोर्ध्वे तुलां सम्यङ् निवेशयेत् ।
दण्डोच्चं वा त्रिपादोच्चमर्धतारसमन्वितम् ॥ ३६ ॥

76. F : omits verse 30.
77. D : सोच्चत्रिपाद-; E : स्वोच्चत्रिभाग
78. E : दण्डत्रिपादसार्धो वा प्रतिवक्त्रविनिर्गतः
79. D : omits 31a.
80. A, B, C, F : स्थिता
81. F : ऋजुर्वास्मात् प्रतेर्क्रियः
82. D : तु तत् क्रिया for इति त्रिधा
83. F : omits 33a.
84. D : नागपद्मं for नागवक्त्रं
85. D : क्रियात् for क्रियम्
86. A, C : द्विजादीनां
87. D : संभवेत् मकरं
88. D : चतुरश्रेन्दुखण्डाद्यं मकरं क्षुद्रखण्डकम्
89. D : हस्तिरूपं भवेदूर्ध्वे वृत्ततश्च निवृत्तकम्; E : स्वस्तिरूपकदण्डं वा वृत्ताग्रात् वार्धचन्द्रकम्; F : स्वरितरूपं भवेद् मुद्गं वृत्ताग्रं चार्धचन्द्रका ।
90. A : प्रत्ताग्रं
91. C : कुकुरं
92. E : कुकुतं बन्धम्; F : कटिबन्धं स्यात्

29b-32a Above this is the frieze[21] with a height of one module or three quarters or half a module and with a projection three quarters or half its height. Or else, the projection of the front of the frieze is one module, one module and a quarter or one module and a half and its height should be that indicated above. This frieze is ornamented with *vyāla*, lions or elephants or it may be bare.[22] (Above) there is a fillet of which the height and projection is a third or a quarter that (of the frieze).

32b-35 There are three types of frieze: *samakara*, *citrakhaṇḍa* and *nāgavaktra*. The upper part of the *nāgavaktra* has the auspicious form (?) of a snake's hood. The *samakara* is fitting for gods and brahmins; it has a square profile and is crowned by a *makara*. The *citrakhaṇḍa* is suitable for princes, merchants and śūdra; (its profile) is semicircular and its face has a decoration of elephants; the form of its upper part may vary so it is called, accordingly, *kakara*, *karkaṭa*, *bandha* or by some other name (?).

Arrangement of the beams

36-39a The beams must be arranged above the upper fascia (of the architrave) or above the *valīka* (?).[23] These *valīka* are one module or three quarters of a module high, their width is half their height and their length three, four or five modules. They end in a gargoyle or in a *vyāla* or like a point or in a form resembling a wave,[24] resting on side elements

21. *Prati*: see above note 2.
22. *Ṛjvī*: literally 'straight'.
23. We do not know what are those elements (one may think of some relation with the *valaya* mentioned above but it does not make the things clearer). The beams will be dealt with in vv. 39b sq.
24. *Taraṅga*: a common decoration on bracket-capitals (see 15.48-50).

त्रिचतुष्पञ्चदण्डेन दीर्घं[93] तत् साग्रनालिकम्[94] ।
सव्यालाग्रं सम्भृताग्रं[95] पार्श्वाङ्गस्थतरङ्गवत्[96] ॥ ३७ ॥
[97]वलीकं स्याद् वलीकोर्ध्वे[98] कर्तव्या वर्णपट्टिका[99] ।
दण्डार्धार्धविशालोच्चा निश्छिद्रं स्यात्[100] तदन्तरे ॥ ३८ ॥
फलकैश्च तदूर्ध्वे तु दण्डोत्सेधा तुला स्थिरा[101] ।
[102]त्रिपादविस्तृता न्यस्ता प्रवेशानुगता शुभा ॥ ३९ ॥
तुलाविस्तारतारोच्चा जयन्ती स्यात् तुलोपरि ।
अर्धदण्डेन तत्रोच्चा जयन्त्यूर्ध्वेऽनुमार्गकम् ॥ ४० ॥
तदूर्ध्वे फलका पादपादषड्भागतीव्रकाः[103] ।
इष्टकाचूर्णसङ्घात[104]प्रस्तरस्तम्भविस्तरम्[105] ॥ ४१ ॥
[106]करालमुद्गिगुल्मासकल्कचिक्कणकर्मवान् ।
उत्तरं वाजनं चैव तत्पार्श्वानुगतं भवेत्[107] ॥ ४२ ॥
[108]तुला[109] द्वारानुयाता हि जयन्ती तिर्यगागता[110] ।
[111]अनुमार्गं तदूर्ध्वे तु[112] द्वारस्यानुगतं शुभम् ॥ ४३ ॥
[113]द्वारतिर्यग्गता वाऽथ तुला देवनृपेशयोः ।
त्रिदण्डं वा द्विदण्डं वा स्याद् वलीकतुलान्तरम्[114] ॥ ४४ ॥
द्विदण्डं सार्धमध्यर्धं[115] जयन्त्यन्तरमिष्यते ।
दण्डान्तरमनुमार्गं निश्छिद्रं स्यात् तदूर्ध्वतः ॥ ४५ ॥

93. D, F : दैर्घं
94. D : साग्रनालकम्
95. E, F : सम्भूताग्रं
96. D : पार्श्वोचस्थितरङ्गवत्
97. D : फलिकं; E : पालिकं
98. D : फलिकोर्ध्वे
99. F : वश्यपट्टिका
100. D : निच्छिद्रव्यात्
101. E : स्थिता
102. F : omits 39b-40a.
103. D, E : नीव्रकाः
104. D : संपूर्ण for सङ्घात-
105. C : विस्तरः
106. D : तरालमुद्गगुल्फाश्च
107. F : शुभम्
108. E : तुला द्वारानुधताभिजयन्ती तत् त्र्यस्रताम् ।
109. D : मूला
110. D : तत्र्यवर्गता
111. F : अन्यमार्गं
112. D : स्यात्
113. E : द्वारत्रिवर्गता
114. D : बलिकं तलान्तरम्
115. D : सार्धमध्यर्धा

(?). Such are *valīka*, above which a 'decorative band' (*varṇapaṭṭikā*) should be placed, a quarter of a module in height and width (?). The space between them is to be closed up by planks.[25]

39b Strong beams,[26] one module high and with a width three quarters their height, are placed next above; to be properly arranged their orientation should be the same as that of the door.

40-41a Above the beams are the joists whose width and height are equal to the width of the beams, unless their height makes up half a module. Above the joists are the small joists and above those are the planks whose thickness is a sixth or an eighth (of a module).

41b-42a The assembling of the entablature and pillars is to be done with a mixture of bricks and lime to which are added *karāla, mudgī, gulmāṣa, kalka* and *cikkaṇa*.[27]

42b-44a The architrave and its upper fascia are to be placed perpendicular (to the axis of the door). The beams must have the same orientation as the door and the joists are perpendicular (to them); the small joists above lie in the same direction (as the door does); this is auspicious. For gods and kings however the beams may be perpendicular to the door.

44b-45 The intervals between beams and those between *valīka* are of two or three modules; the joists are separated one from the other, by two, two and a half or one and a half modules; between the small joists are spaces of one module each and (the roofing) above them is to be unbroken.

25. See above vv. 17-18.

26. Beams, joists and small joists support the ceiling.

27. Cf. below v. 49 and 18.92 sq.

अथ चित्रविचित्राङ्गा[116] विधेया प्रस्तरक्रिया ।
क्षुद्राणां तु तुलादीनि यथा स्थैर्यं तथाचरेत् ॥ ४६ ॥
विरूपं वा सरूपं वा सर्वमङ्गं प्रयोजयेत् ।
तुलाद्रव्योपरिष्टात् तु फलकाच्छादनं तु वा ॥ ४७ ॥
इष्टका वा[117] पिधातव्या शेषं पूर्ववदाचरेत् ।

[प्रस्तरमानम्]

पङ्क्त्यष्टभागविकलं[118] हि मसूरकोच्चा-
न्मञ्चोन्नतं मतमथो[119] तलिपार्धकं वा ।
यावद् बलं विपुलसुन्दरतां[120] समेति
तावद् विधेयमधुना विधिना विधिज्ञैः ॥ ४८ ॥

[लेपः]

मधुघृत[121]दधिदुग्धं माषयूषं च चर्म[122]
कदलिफलगुलं[123] च त्रैफलं नालिकेरम् ।
क्रमवशमनुभागैर्वर्धितं[124] लब्धचूर्णं
शतमथ कृतमस्य द्वैगुणं शर्करास्तु ॥ ४९ ॥

[युग्मायुग्ममानम्]

हस्तस्तम्भतुलादिकान् नरगृहे युञ्ज्यादयुग्मं यथा
युग्मायुग्मकसंख्यया सुरगृहे युञ्जीत[125] हस्तादिकान् ।

116. A, C, E, F : चित्रविकल्पाङ्गा; D : चित्रविकलाङ्गा
117. A : इष्टकाभिः
118. E : विपुलं instead of विकलं
119. A, C : मतमघो; D : यथमथो
120. D : मन्तरतां for सुन्दरतां
121. D : व्रत- for घृत-
122. F : सम्यक्
123. C : गुडं; F : गुलैः
124. C : बद्धितं
125. D : युञ्ज्यात्

46-47 The entablature is made up of elements that may or may not be decorated. The beams and other elements of small (buildings) are calculated with view to solidity.[28] There may or may not be images on any one of these elements. Above the framework there is a ceiling of planks or of bricks, (in which case) the procedure is still as above.

Height of the entablature

48 The height of the entablature is equal to that of the base, less a tenth or an eighth or it is half the height of the pillars.[29] The height of the entablature should be so calculated that it is solid, in proportion to the whole (building) and of pleasant appearance; it is in this manner that the well-advised proceed.

Preparation of the coating[30]

49 (To make the coating) the following are used: honey, ghee, curds, milk, bean water, (scraps of) leather, bananas, molasses, juice of the fruits of the three myrobolans and coconut milk; these products, in prescribed proportions, are added to lime and a hundred parts of this mixture are mixed with twice that quantity of gravel.

28. That is to say that they do not necessarily follow the rules for proportions given above.
29. In that case it is as high as the base is, a proportion frequently used (cf. 20.4-5 . . .).
30. For a more detailed account see 18.92 sq.

[द्वारम्]

[126]मध्ये द्वारमनिन्दितं सुरमहीदेवक्षितीशालये
शेषाणामुपमध्यमेव विहितं तत् सम्पदामास्पदम् ॥ ५० ॥

[वेदिः]

[127]प्रतेरुपरि वेदिः स्यात् सार्धद्वित्र्यङ्घ्रिणोदयम् ॥ ५१ ॥
द्वौ षट् चत्वारि कम्पानि पादपादघनानि च ।
पद्मशैवल[128]पत्रादिचित्राङ्गा वेदिका मताः ॥ ५२ ॥
[129]कम्पाधस्तात् प्रयोज्या हि[130] स्तम्भास्तत्रैव युक्तितः ।
[131]ऊर्ध्वाधः कम्पवत् पद्मपट्टिकं चाग्रबन्धनम् ॥ ५३ ॥

[जालकानि]

वेदिकोपरि योज्यानि[132] जालकानि विचक्षणैः ।
त्यक्त्वा भित्त्यङ्घ्रिमध्यं तु चतुर्दण्डान्तविस्तृतम्[133] ॥ ५४ ॥
[134]द्विदण्डादिनिजव्यासद्विगुणं तुङ्गमीरितम्[135] ।
[136]सार्धमङ्घ्र्यूनकं वोच्चं त्यक्त्वा मध्याङ्घ्रिरन्ध्रकम् ॥ ५५ ॥

126. D : मध्य-
127. D : व्रतेरुपरि; E : वृतेरुपरि
128. D : शैवाल-; E : शैवज-
129. E : omits 53a.
130. D : प्रयोक्तानि; F : प्रयोज्यानि
131. D : omits 53b.
132. A : लोज्यानि; D : यग्यानि
133. D : चतुर्दण्डन्तु विस्तृतम्
134. D : द्विदण्डादीनि द्रव्यासं द्विगुणं तुङ्गमीरितम्; E : द्विदण्डार्धपदोनं व्यासद्वगुणतुङ्गतः
135. F : मुङ्गमुच्यते
136. D : सार्धमङ्घ्रिकृतं वोच्चं त्यक्त्वार्धाङ्घ्रिरन्ध्रकम् ।

Even and odd measurements[31]

50a In the houses of men, cubits, pillars, beams and other elements of that type are of odd numbers but, in those of gods, the numbers may be even or odd.

The door

50b There is no error in placing the door of a building meant for gods, brahmins or kings in the middle of the facade, but for all other categories an auspicious door is placed to one side of the middle of the facade.[32]

The stereobate[33]

51 Above the frieze (*prati*) (of the entablature) is the stereobate (*vedī*) of the attic the height of which is one and a half, one and three quarters or twice (that of the frieze).

52 It has two, four or six horizontal mouldings (? *kampa*) whose thickness is equal to a quarter of a module; these mouldings are ornamented with leaves of lotus, of *śaivala* or of other plants.

53 Dwarf pillars are arranged above these mouldings; at the top and bottom are, respectively, a string-course with lotus decorations and an *agrabandhana*[34] with the same profile as the horizontal mouldings.

Latticed windows[35]

54-55a The sages are to place the latticed windows (*jālaka*) above a stereobate in such a way that they don't (coincide) with the middle of the wall or the axis of a pillar.[36] Their width is from two to four modules and their height twice the chosen width or else it may be one and a half or one and three quarters that width.

31. Verse 16.50=26.196.
32. For position of doors see 19.20 sq. and note *ad loc.*
33. The stereobate placed between entablature and attic is again dealt with in chapter 18 (v. 2).
34. *Agrabandhana*: literally 'top connection'; it is probably a moulding arranged in such a way as to establish a smooth passage to the upper element.
35. *Jālaka*: cf. *Śilparatna* (chapter 24), *Īśānaśiva* (Kriyā. 32.55 sq.)
36. Thus the position of windows follows the same rule than that of doors (supra v. 50b).

[137]युग्मायुग्माङ्घ्रिभिः कम्पैर्युक्तं तुङ्गे च[138] वैपुले ।
गवाक्षं कुञ्जराक्षं[139] च नन्द्यावर्तमृजुक्रियम् ॥ ५६ ॥
[140]पुष्पखण्डं सकर्णं च योजितव्यं यथोचितम् ।
[141]दीर्घाश्रं[142] कर्णकच्छिद्रं तद् गवाक्षमिति स्मृतम् ॥ ५७ ॥
[143]युग्माश्रं कर्णकच्छिद्रं[144] कुञ्जराक्षमिति स्मृतम् ।
[145]पञ्चसूत्रमयच्छिद्रं प्रदक्षिणवशात् कृतम् ॥ ५८ ॥
नन्द्यावर्ताकृतिवशान्नन्द्यावर्तमिति स्मृतम् ।
[146]स्तम्भतिर्यग्गतं कम्पमृजुत्वात् तदृजुक्रियम्[147] ॥ ५९ ॥
[148]पुष्पखण्डं सकर्णं[149] च नन्द्यावर्तं तथोच्यते ।
भित्तिमध्याद् बहिस्तस्य[150] स्तम्भयोगं कवाटयुक्[151] ॥ ६० ॥
कवाटयुगलं वैकं घाटनोद्घाटन क्षमम्[152] ।
[153]पादवर्गे भवेद् ग्रीवावर्गे वातायनस्थितिः ॥ ६१ ॥
गुलिकाजालकं धामविन्यासाकृतिरन्ध्रकम् ।
स्वस्तिकं वर्धमानं च सर्वतोभद्रसन्निभम्[154] ॥ ६२ ॥

[भित्तिः]

[155]द्रुमोपलेष्टकाद्रव्यैर्युक्त्या युञ्जीत बुद्धिमान् ।
जालकं फालकं कुड्यमैष्टकं[156] च त्रिधा मतम् ॥ ६३ ॥

137. D : omits 56a.
138. E : तु instead of च
139. D : रुञ्जराक्षं
140. D : पुष्पकण्ठं सङ्कीर्णं च नन्द्यावर्तं यथोचितम् ।
141. D : दीव्याश्रं कर्णचित्तं तत् गवाक्षमिति विस्तृतम् ।
142. E, F : दीर्घाग्रं
143. F : omits 58a.
144. C, D : युगाश्रं कर्णगच्छिद्रं; E : युगाग्रं कर्णकृत्छिद्रं
145. C : पञ्चसूत्रमघच्छिद्रं; D : पञ्चसूत्रं याच्छिद्रं
146. E : भित्तितिर्यग्गतं
147. C : कम्पमृजुत्वा जालकाक्रिया
148. D : पुष्पकर्णं
149. E : सखण्डं; F : समखण्डं
150. D : भित्तिमध्याब्जभूतस्तु
151. E : कवाटकम्
152. D : घाटनोद्घाटनात्मकम्
153. D : पादवर्गं भवेद् ग्रीववर्गो पातायनास्थितः;
154. D : सर्वतोभद्रमेव च
155. D : द्रुमे शिलेष्टकैर्द्रव्यैः युक्त्या
156. D : कुण्टं पौष्टिकं

55b-56a The construction of a window with a median mullion is to be avoided. The latticed windows have, vertically, an even or odd number of uprights as do the transoms, arranged according to width.

56b-57a According to circumstances the following types of window may be made: *gavāksa*, *kuñjarākṣa*, *nandyāvarta*, *ṛjukriya*, *puṣpakhaṇḍa*, *sakarṇa*.

57b-60a *Gavākṣa* is the name of the one whose polygonal embrasure comprises an odd number of sides.[37] That whose polygonal embrasure comprises an even number of sides is called *kuñjarākṣa*. That whose embrasure is delimited by five lines which, clockwise, determine a *nandyāvarta* figure is called *nandyāvarta*. That with uprights and transoms crossing at right angles is called *ṛjukriya*. The *puṣpakhaṇḍa* and *sakarṇa* types resemble the *nandyāvarta* type.

60b-61 The two jambs (of the window) do not coincide with the middle of the wall and they have shutters, either one or two shutters, that can be opened and closed. The windows are at the level of the pillars or at that of the attic.[38]

62 The circular windows have an embrasure in the form of the sun; (there are three types): *svastika*, *vardhamāna* and *sarvatobhadra*.

Walls[39]

63 According to the specific case, the well-advised man builds (the walls) of wood, stone or bricks. There are three sorts of walls: latticed wall, plank wall and brick wall.

37. *Gavākṣa*, the common term to designate any window, is here used in a more technical meaning. However this 'oeil-de-boeuf' is very different from what it is in European architecture.

38. *Pādavarga* = *jaṅghāvarga* (cf. 14.10 and note ad loc.).

39. For a more detailed account see *Śilparatna* chapter 21.

जालकं जालकैर्युक्तमिष्टकामयमैष्टकम्[157] ।
[158]फालकं फलकोपेतं भित्तिमध्येऽङ्घ्रिसंयुतम् ॥ ६४ ॥
भित्तिबन्धनमूर्ध्वाधःपद्मसङ्घट्टपट्टिकम् ।
पादपादषडष्टांश[159] बहला फलका भवेत् ॥ ६५ ॥
शिबिकाकुड्यवद् वाऽथ सर्वत्र फलकामयम्[160] ।
एतत् तु फलकाकुड्यं यत् तु यत्र[161] यथोचितम् ॥ ६६ ॥
[162]तदेव तत्र योज्यं स्याद् वस्तुविद्याविचक्षणैः[163] ॥ ६६½ ॥
[164]एवं प्रोक्तं प्रस्तरं वेदिकाङ्गं
युक्त्या तज्ज्ञैर्जालकं च त्रिकुड्यम् ।
[165]नैव च्छेद्या वेदिका जालकार्थं
न प्रत्यङ्गं सर्वतश्छेदनीयम् ॥ ६७½ ॥

इति मयमते वस्तुशास्त्रे प्रस्तरकरणं नाम
षोडशोऽध्यायः

157. D : इष्टकैः
158. F : जालकं
159. D : अष्टाङ्ग- instead of अष्टांश-
160. D : फलकाट्टशम्
161. D : यत्र यत्र
162. D : omits 66½
163. E : वस्तुवास्तुविचक्षणैः
164. D : omits 67a.
165. E : नैव छिद्रा चेकोजालकांर्थं

64-66 The latticed wall is provided with latticed windows. The brick wall is of bricks. The plank wall is of planks and comprises a median upright; at top and bottom the assembly of the (plank) wall is made up of a band with lotus decoration (?); the thickness of the planks is equal to a quarter, a sixth or an eighth (of the diameter) of the pillars or else the plank wall may, according to the case in question (?) resemble the side of a palanquin;[40] such is to be the plank wall, there, where prescribed by the sages versed in the science of architecture.

Envoi

67 According to the wise, those are the rules relating to the entablature, to the elements of the stereobate of the attic, to the latticed windows and to the three types of wall. A stereobate must not be interrupted by the installation of a window. In no case should a moulding of a stereobate be interrupted.[41]

Thus ends in the *Mayamata*, treatise on dwelling, the sixteenth chapter : RULES FOR ENTABLATURES.

40. Palanquins (*śibikā*) are described in chapter 31. The simile given here implies probably that the plank wall is lightly built.

41. Cf. chapter 14 note 27.

अथ सप्तदशोऽध्यायः[1]

[सन्धिकर्मविधानम्]

[2]पार्श्वगस्थितशयितद्रव्याणां सन्धिरुच्यते ।
एकस्मिन् वस्तुनि द्रव्यैर्बहुभिश्च निघट्टनात् ॥ १ ॥
[3]दुर्बलत्वाद् द्रुमाग्राणामबले बलवर्धनात् ।
सन्धिकर्म प्रशस्तं स्यात् सजातीयैर्वरद्रुमैः ॥ २ ॥

[सन्धिभेदाः]

मल्ललीलं तथा ब्रह्मराजं वै वेणुपर्वकम् ।
[4]पूकपर्वं देवसन्धिर्दण्डिका षड्विधाः स्मृता ॥ ३ ॥

[सन्धिविधिः]

चतुर्दिक्षु बहिः स्थित्वा निरीक्ष्य स्थपतिर्गृहम् ।
[5]दक्षिणादक्षिणे दीर्घादीर्घाभ्यां सन्धयेत्[6] क्रमात् ॥ ४ ॥
मध्ये च दक्षिणे चैव यः[7] सन्धिं कर्तुमीहते[8] ।
[9]मध्येऽतिदीर्घं युञ्जीयाद् दीर्घमल्पं च पूर्ववत् ॥ ५ ॥
वामेऽवामे समद्रव्यं मध्ये दीर्घमथापि वा ।
[10]मध्यद्रव्यं विना वामेऽवामे द्रव्यं समं तथा[11] ॥ ६ ॥
एतत्सन्धिं बहिः कुर्यात् तथैवाभ्यन्तरे विदुः ।
स्थपतिर्हृदयस्थाने स्थित्या प्रेक्ष्य[12] चतुर्दिशि ॥ ७ ॥

1. Chapter missing in F.
2. E : पर्श्वस्तत्रिरायितानां द्रव्याणां सन्धिरुच्यते ।
3. D : दुर्बलश्च
4. C : एकपर्वं; E : पूगपर्वं
5. C : दक्षिणे दक्षिणा; D : दक्षिणे दक्षिणे
6. E : सलयेत्
7. D, E : वामयेत् instead of चैव यः
8. E : इयते
9. D : मध्ये च दीर्घं
10. D : मध्ये द्रुमं विना वामेऽक्षमे द्रव्यं समं तु वा ।
11. E : तु वा
12. D : पार्श्वे

CHAPTER 17

JOINERY[1]

1 Now the assembling of oblique, vertical and horizontal pieces is explained. A single construction (is made) with many pieces (and results) from their being assembled.

2 Weakness (being the characteristic) of the tops of trees the solidity increases with distance from it.[2] It is prescribed that assemblies should be made with wood of good quality and of uniform type.

Varieties of assembly

3 There are six sorts of assembly: ***mallalīla***, ***brahmarāja***, ***veṇuparvaka***, ***pūkaparva***, ***devasandhi*** and ***daṇḍikā***.

Rules for assembling

4-7a The architect, standing outside, at the four cardinal points, should first examine the house.[3] Then he is to assemble, to the right and to the left, what is long and what is short, respectively. If his intention is to make an assembly at the centre and to the right, then he assembles a very long piece in the centre and long and short ones as before. Otherwise, pieces of uniform size should be assembled to left and right with a longer one in the middle; but, if there is no middle piece, then the pieces of equal size are assembled to left and right. This is the way assemblies are done, exterior (to the house).[4]

1. Cf. *Mānasāra* (chapter 17), *Īśānaśiva* (Kriyā. 33.73-101) and *Śilparatna* (21.42 sq.).
2. Cf. *Mānasāra* (17.3-4):

   वृक्षमूले बलं युक्तं वृक्षाग्रे बलहीनकम् ।
   तस्मात्तु बन्धयेत्सर्वं दारुसम्मूलात् शूलतः सुधीः ॥
3. According to *Mañasāra* (17.27-30) it is the pieces to be assembled that the architect examines.
4. Meaning of such prescriptions is not clear.

दीर्घमल्पं समद्रव्यं पूर्ववत् परिकल्पयेत् ।
आधाराधेयनीत्यैव[13] द्रव्यसन्धानमूह्यताम् ॥ ८ ॥
मूले मूलं न युञ्जीयादग्रे चाग्रं तथैव च ।
मूलाग्रद्रव्ययोगेन सन्धिकर्म सुखप्रदम् ॥ ९ ॥
[14]मूलं हि शयितं [15]चाधश्चाग्रमूर्ध्वे तु योजयेत् ।

[मल्ललीलादिसन्धयः]

[16]द्विद्रव्यमेकसन्धि स्यान्मल्ललीलमिति स्मृतम् ॥ १० ॥
[17]त्रिद्रव्यैस्तु द्विसन्धि स्याद् ब्रह्मराजमितीरितम्[18] ।
चतुर्भिः पञ्चभिर्द्रव्यैस्त्रिचतुः सन्धयः क्रमात् ॥ ११ ॥
[19]वेणुपर्वमिति प्रोक्तं तैतलानां नृणां गृहे ।
षड्भिस्तु सप्तभिर्द्रव्यैः[20] सन्धयः पञ्च षट् क्रमात् ॥ १२ ॥
[21]पूकपर्वेति तत् प्रोक्तं धनधान्यकरं स्मृतम् ।
अष्टभिर्नवभिर्द्रव्यैः सन्धयः सप्त वाऽष्टधा[22] ॥ १३ ॥
देवसन्धिरिति प्रोक्तः सर्ववासेषु योग्यतः ।
[23]बहुसन्धिर्बहुद्रव्यैर्दीर्घमल्पं[24] च पूर्ववत् ॥ १४ ॥
दण्डिकेति समाख्याता धनधान्यसुखप्रदा ।

[सर्वतोभद्रसन्धिः]

दक्षिणापरभागे तु द्रव्यमूलं प्रशस्यते ॥ १५ ॥
अग्रमग्रं तथैशान्ये तेषां बन्धनमुच्यते ।

13. C : -रीत्यैव
14. E : मूलाग्नि
15. D : सहितश्चाथ
16. D : द्विद्रव्यं हि सन्धि स्यादल्पलीलमिति स्मृतम् ।
17. E : त्रिद्रव्यं तु
18. D, E : ब्रह्मराजेति कथ्यते
19. D : पञ्चपर्वमिति
20. E : पञ्चसन्धिर्वा
21. C : एकपर्वं; E : पूगपर्वं
22. E : वाष्टवा
23. E : बहुद्रव्यैः कृतं यत्तु दीर्घमल्पं पूर्ववत् ।
24. D : दीर्घमध्यं

7b-8a The following procedure is described for the interior: the architect, standing at the heart of the house,[5] should examine it towards the four directions and then assemble, as indicated above, long, short and equally sized pieces.

8b-10a It is said that the pieces must be assembled with the awareness that one will support and the other be supported.[6] The bottom (of a piece) should not be put together with the bottom (of another one) nor top with top.[7] An assembly is marked for success when it unites the bottom (of a piece) with the top (of another); the bottom should be arranged below and the top above.

Assemblies: mallalīla . . . etc.

10b-12a *Mallalīla* is the name of a single assembly which unites two pieces. A *brahmarāja* assembly occurs where three pieces are united by two assemblies. When there are four or five pieces and, accordingly, three or four assemblies, this is a *veṇuparva* suitable for the houses of both gods and men.

12b-13a Six or seven pieces and, accordingly, five or six assemblies, make up a *pūkaparva* said to bring riches.

13b-14a When there are eight or nine pieces and seven or eight assemblies, this is a *devasandhi* suitable for all dwellings.

14b-15a When there are many assemblies and many pieces, the long and the short being assembled as above, this is a *daṇḍikā* which bestows riches and happiness.

Sarvatobhadra assembly

15b-18 The bottom of the (first) piece should be in the south-east (corner) and its top in the north-east; their assemblies are now given: the first

5. *Hṛdayasthāne:* That is to say on the square of Brahmā.

6. That is to say that pieces are to be put one above the other without being any interpenetration; it is the method followed in most of the assemblies described below.

7. See also v. 37.

[25]आधारं प्रथमं प्राच्यां मूलाग्रच्छेदनान्वितम् ॥ १६ ॥
दक्षिणोत्तरयोरग्रं तस्योपरि निधापयेत् ।
[26]दक्षिणोत्तरयोर्मूलमूर्ध्वच्छेदनसंयुतम् ॥ १७ ॥
पश्चिमस्थमधश्छेद्यं क्षेप्यमाधेययोगतः ।
एतत् तु सर्वतोभद्रमवागादि तथा विदुः ॥ १८ ॥

[नन्द्यावर्तसन्धिः]

[27]नन्द्यावर्तविधानेन नन्द्यावर्तं प्रकल्पयेत् ।
दक्षिणोत्तरगं दीर्घं दक्षिणे तु सकर्णकम् ॥ १९ ॥
प्राक्प्रत्यग्गतमायामं पश्चिमे तु सकर्णकम् ।
[28]दक्षिणोत्तरगं दीर्घमुत्तरे तु सकर्णकम् ॥ २० ॥
[29]पूर्वपश्चिमगं दीर्घं पूर्वायां तु सकर्णकम् ।
आधाराधेयनीत्यैव पूर्वादीनि च विन्यसेत् ॥ २१ ॥
नन्द्यावर्तमिदं तद्वदवागादीनि च क्रमात् ।

[स्वस्तिबन्धसन्धिः]

पक्षयोर्बहुभिर्द्रव्यैर्दीर्घं प्रागुदगग्रकम् ॥ २२ ॥
सशिखैश्च बहुद्रव्यैर्द्वाभ्यां वा तिर्यगग्रकम्[30] ।
स्वस्त्याकृतिसमायुक्तं स्वस्तिबन्धनमिष्यते ॥ २३ ॥

[वर्धमानसन्धिः]

परितो बहुभिर्द्रव्यैर्युक्तं तद्वत् तदन्तरे ।
[31]मध्येऽङ्कणसमायुक्तं बाह्ये [32]युक्त्या सभद्रकम् ॥ २४ ॥

25. C : अधारः
26. D : दक्षिणोत्तरयोरूर्ध्वं च्छदनं दरुसंयुतम् ।
27. D : omits 19a; E : वन्द्यावर्तविधानेन तदेवादीवि च क्रमात् ।
23. E : omits 20b-21a.
29. पूर्वपश्चिमदीर्घं यत् पूर्वायां तु सकर्णकम् ।
30. D : नियोगतम्
31. E : मध्यकर्णसमायुक्तं बाह्ये युग्मं सभद्रकम्
32. A, D : युक्ता; C : युक्तं

supporting piece is on the eastern side and its bottom and top are cut (on their upper face); it is on them that the tops of the south and north pieces should rest; their bottoms are cut on the upper face and (on them rest) the western piece, the top and bottom of which are cut on its lower face and which is a supported piece. Such an assembly is called *sarvatobhadra* and it must be carried out with the south as the starting point.[8]

Nandyāvarta assembly

19-21a The *nandyāvarta* assembly is made in the form of a *nandyāvarta* figure. One long piece stretching from north to south has a projection at its southern (end); another long piece, stretching from east to west has a projection in the west; a (third) long piece, stretching from south to north, has a projection in the north and a long west-east piece has a projection in the east.

21b-22a The assembling of these pieces starts in the east and one is considered as supporting and the other as supported each time. This is the *nandyāvarta* assembly which may equally have its starting point in the south.

Svastibandha assembly

22b-23 When there is a long piece with its top at the north-east (joined) to several pieces on either side, when there is a perpendicular piece (joined) by tenons to two or more pieces and when all this is arranged in *svasti(-ka),* the assembly is called *svastibandha*.

Vardhamāna assembly

24-26a When there are a number of pieces all around and as many within, when there is a courtyard(-like space) at the centre with forepart(-like

8. See Fig. 10 p. LVIII. The *Mānasāra* (17.19-21a) gives a different account of that assembly:
दक्षिणोत्त्ररमायामं दारुमूलं च दक्षिणे ।
पूर्वपश्चिमयोर्दीर्घं दारुमूलं च पश्चिमे ॥
प्रत्यग्दक्षिणयोर्दारुमूलसंयोगं नैर्ऋते ।
पूर्वे चोत्तरे दारु चाग्रं संयोगमीशके ॥
अनलानिलकोणे तु चाग्रमूलं तु योजयेत् ।

[33]पूर्वद्रव्यं [34]परद्रव्यं भद्रकं[35] दक्षिणोत्तरम् ।
शालानां भित्तिमाश्रित्य युक्त्या साधु[36] समाचरेत् ॥ २५ ॥
एवं युञ्ज्यादिदं बन्धं [37]वर्धमानमितीरितम् ।
अधोभूमिक्रियायुक्त्या[38] स्यादूर्ध्वोर्ध्वतलं प्रति ॥ २६ ॥
विपरीतं विपत्त्यै स्यादिति शास्त्रविनिश्चयः ।
[39]दीर्घादीर्घेषु संयोगद्रव्यसन्धानतर्पणम् ॥ २७ ॥
यथाबलं यथायोगं[40] तथा योज्यं[41] विचक्षणैः ।
एवं विधिविशिष्टं स्यात् सम्पत्त्यै द्रव्यबन्धनम्[42] ॥ २८ ॥

[सन्धिभेदाः]

[43]मेषयुद्धं त्रिखण्डं च सौभद्रं चार्धपाणिकम् ।
महावृत्तं च पञ्चैते स्तम्भानां सन्धयः स्मृताः[44] ॥ २९ ॥
[45]षट्शिखा झषदन्तं च सूकरघ्राणमेव च ।
सङ्कीर्णकीलं वज्राभं पञ्चैव शयितेष्वपि ॥ ३० ॥

[स्तम्भसन्धयः]

स्वव्यासकर्णमध्यर्धद्विगुणं वा तदायतम् ।
त्र्यंशैकं मध्यमशिखं[46] मेषयुद्धं[47] प्रकीर्तितम् ॥ ३१ ॥
स्वस्त्याकारं त्रिखण्डं स्यात् सत्रिचूलि त्रिखण्डकम्[48] ।
पार्श्वे चतुःशिखोपेतं सौभद्रमिति संज्ञितम्[49] ॥ ३२ ॥

33. E : omits verse 25.
34. D : पूर्वभद्रं
35. D : मृदकं
36. D : युक्तांशायुः
37. D : वर्तमानम्
38. D : युञ्ज्यात् for युक्त्या
39. C : दीर्घादूर्ध्वेषु
40. C, D : यथा शोभं
41. A : तथा योग्यं; E : तथा योगं
42. D : द्रष्टबन्धनम्
43. D : मेषबन्धं
44. D : क्रमात्
45. D : षट्शिखात्वष्टदन्तश्च सूकरघ्राणबन्धनम्
46. C : मध्यशिखरे
47. D : मेषयुग्मं
48. D : त्रिबन्धकम्
49. E : संस्मृतम्

projections) outside, according to circumstances, when east and west foreparts extend north and south, when these foreparts are correctly placed after the rooms have been properly put together, the result is known as a *vardhamāna* assembly (?).[9]

26b-27a The assemblies are to be made, on every upper floor of the building, just as they are made on the ground floor. Any deviation from this rule leads to certain failure according to the Treatises.

27b-28 The pieces of a whole, whether long or short, must be assembled with a view to the obtaining of a solid ensemble adapted to the needs of the case in question. The skilled will proceed thus and a building realized in this way gives promise of success.

Assemblies for pillars and for horizontal elements

29 It is said that there are five types of assembly suitable for pillars: these are *meṣayuddha*, *trikhaṇḍa*, *saubhadra*, *ardhapāṇi* and *mahāvṛtta*.

30 These are the five types of assembly suitable for horizontal elements:[10] *ṣaṭśikhā*, *jhaṣadanta*, *sūkaraghrāṇa*, *saṅkīrṇakīla* and *vajrābha*.

Assembling the pillars[11]

31 When there is a central tenon (with a width) a third (that of the pillar) and a length twice or two and a half times its width, this is a *meṣayuddha* (mortice-and-tenon) assembly.

32 In the *trikhaṇḍaka* assembly, there are three mortices and three tenons arranged as a *svasti(-ka)*. The assembly called *saubhadra* comprises four peripheral tenons.

9. It is not clear if this *vardhamāna* assembly corresponds to the arrangements of some specific timber work or to that of a house with four main buildings (*catuśśāla*).

10. That is to say architrave, beams, joists, small joists . . . etc.

11. We have indicated between brackets after the name given to assembly, the technical equivalent in European joinery.

[50]अर्धं छित्त्वा तु मूलेऽग्रे चान्योन्याभिनिवेशनात् ।
अर्धपाणिरिति प्रोक्तो गृहीतघनमानतः ॥ ३३ ॥
[51]अर्धवृत्तशिखं मध्ये तन्महावृत्तमुच्यते ।
वृत्ताकृतिषु पादेषु प्रयुञ्जीत विचक्षणः ॥ ३४ ॥
स्तम्भानां स्तम्भदैर्घ्यार्धादधः सन्धानमाचरेत् ।
स्तम्भमध्योर्ध्वसन्धिश्चेद् विपदामास्पदं सदा ॥ ३५ ॥
[52]कुम्भमण्ड्यादिसंयुक्तं सन्धानं सम्पदां पदम् ।
सालङ्कारे शिलास्तम्भे यथा योगं तथाचरेत्[53] ॥ ३६ ॥
स्थितस्य पादपस्याङ्गप्रवृत्तिवशतो विदुः ।
ऊर्ध्वमूलमधश्चाग्रं सर्वसम्पद्विनाशनम् ॥ ३७ ॥

[शयितसन्धयः]

[54]अर्धपाणिद्विललाटे लाङ्गलाकारषट्शिखा ।
घनमध्यस्थकीला या सा मता षट्शिखाह्वया ॥ ३८ ॥
स्वायामतिर्यग्बाहुस्थशिखं[55] तु झषदन्तकम् ।
ऊर्ध्वाधस्ताद् यथायोग्यं यथाबलशिखान्वितम् ॥ ३९ ॥
[56]सूकरघ्राणमित्युक्तं सूकरघ्राणसन्निभम् ।
यथाबलं यथायुक्ति नानाबलशिखान्वितम् ॥ ४० ॥
नानाकीलैस्तु सङ्कीर्णं स्यात् तु सङ्कीर्णकीलकम् ।
वज्राकृतिशिखं नाम्ना वज्रसन्निभमेव तत् ॥ ४१ ॥
एतस्मिन् पङ्क्तिसन्धाने[57] सन्धिरेकाकृतिर्भवेत् ।
उपर्युपरि चैवं स्याद् विपरीते विपत्करम् ॥ ४२ ॥

50. E : अन्तश्छिद्रा तु मूले तु चान्यान्याविनिवेशयेत्
51. E : अर्धप्रतिशिखं
52. E : omits 36a.
53. E : तथा भवेत्
54. E : अर्धपारु-
55. D, E : बहुश्चशिखं
56. D : omits 40a.
57. D : पङ्क्तिबन्धने

33 An assembly is called *ardhapāṇi* (scarf joint) when half the lower and half the upper pieces are cut to size according to the thickness chosen (for the pillar).[12]

34 When there is a semicircular section tenon at the centre the assembly is called *mahāvṛtta*; the well advised man employs this for circular section pillars.

35-36 The assembling of (the different parts of) a pillar should be done below the middle and any assembling done above will be a source of failure; (however) the assembly which brings together the bell-capital and the abacus gives the certainty of success. When a stone pillar, with its decoration, (is to be assembled) this should be done according to the specific case.

37 It should be known that the assembling of vertical pieces is done according to the disposition of the different parts of the tree; if the bottom is above and the top below, all chance of success is lost.

Assembling the horizontal elements

38 An assembly is called *ṣaṭśikhā* when six ploughshare-shaped tenons are arranged on both sides of an *ardhapāṇi* (assembly) and, in the middle of its thickness, a pin.

39 The *jhaṣadanta* assembly comprises several tenons on the upper and lower pieces; they are arranged perpendicular to the assembly plan and their number is determined by the solidity required in the specific instance.[13]

40 The *sūkaraghrāṇa* assembly is like the snout of a boar; it comprises tenons of various sizes according to the solidity required and the specific case.

41 The *saṅkīrṇakīla* assembly must be made with pegs of various sizes. The *vajrasannibha* (dovetail) assembly comprises one tenon in the form of a *vajra*.

42 (For a given construction) only one out of this series of assemblies is to be used, from top to bottom; any deviation will lead to failure.

12. See Fig. 11 p. LVIII. This assembly is also used for horizontal pieces (see v. 38).

13. The *jhaṣadanta* assembly differs from the preceding one only by the huge number of tenons (hence its name of 'fishteeth'). Cf. *Īśānaśiva* (Kriyā. 33.85)

झषदन्तो निजायामतिर्यग्बाहुशिखायुतः ।
आधाराधेययोगेन यथाबलशिखायुतम् ॥

अन्तर्मूलं बहिश्चाग्रं पार्श्वद्रव्येषु योजयेत् ।
[58]अन्तरग्रं बहिर्मूलं स्वामिनश्च विनाशनम् ॥ ४३ ॥

[विद्धं कीलं च]

शिखा दन्तं च शूलं च विद्धं पर्यायमीरितम्[59] ।
शल्यं च शङ्कुराणिश्च कीलं पर्यायमुच्यते ॥ ४४ ॥
अष्टसप्तकषडंशके[60]ऽङ्घ्रिके
[61]भागतारमथ शूलकीलयोः ।

[सन्धिदोषाः]

कीलपार्श्वमथ पादमध्यमं
योजयेत् सममुदग्रबुद्धिमान् ॥ ४५ ॥
[62]स्तम्भान्तं दन्तान्तकं चेद् विनाशं
दन्तान्तं चेत् स्तम्भमध्यं तदेव ।
स्तम्भान्तं चेत् सन्धिमध्यं सरोगं
सन्धेर्मध्यं पादमध्यं क्षयं स्यात् ॥ ४६ ॥
दिग्विदिग्द्वारदेवांशं सर्वं त्यक्त्वा प्रयोजयेत् ।
[63]अर्कार्किवरुणेन्दूनां स्थानं दिगिति कीर्तितम् ॥ ४७ ॥
[64]अग्निराक्षसवाय्वीशस्थानं विदिगिति स्मृतम् ।
गृहक्षतश्च पुष्पाख्यो भल्लाटश्च महेन्द्रकः ॥ ४८ ॥
[65]एतेषामंशकद्वारं तत्र सन्धिं न सन्धयेत् ।
शल्यं च दन्तं त्यक्त्वैव पूर्वोक्तानां च सम्मतम् ॥ ४९ ॥

58. E : अन्तराग्रं
59. D : वर्धं परियायमीरितम्; E : बन्धं पर्यायमीरितम्
60. D : -षडङ्के
61. C : भागतारिमथ
62. E : adds between 45 and 46 :
मध्ये दम्भ्रे पूर्वके चोत्तरस्य कीलस्थानं सर्वसम्पत्करं स्यात् ।
मध्यामध्ये वेद विनाशं तस्माद् धीमान् वज्रमार्गेन कुर्यात् ॥
63. D : अर्कादिवरुणेन्द्राणां सूत्रमन्यत्रमेव वा
64. D : omits 48-50.
65. E : आदित्यसत्यकद्वानां स्थिनिसन्धि वधयेत् ।

43 Where lateral pieces are concerned, the bottom is always placed inside and the top outside; if the top is within and the bottom without this will mean the death of the householder.[14]

Tenons and pegs

44 *Śikhā*, *danta*, *śūla* and *viddha* are synonyms (which designate 'tenon'); *śalya*, *śaṅku*, *āṇi* and *kīla* are synonyms (designating 'peg').

45a The width of a tenon or of a peg is an eighth, seventh or sixth the (width of the) pillar.[15]

Errors in assembling

45b-46 One who is very wise must make the side of the peg flush with the centre of the pillar.[16] If the extremity of the pillar coincides with that of the tenon this causes death and the same is true if the extremity of the tenon coincides with the middle of the pillar. If the end of the pillar coincides with the middle of the assembly this will be a source of grief and if the middle of the assembly coincides with the middle of the pillar this will mean death.

47-49 It is essential that assembling on the squares of the gods presiding at the cardinal and intermediate points and at the doors be avoided. The squares of Arka, Ārkin, Varuṇa, and Indu are those of the cardinal points; the squares of Agni, Rākṣasa,[17] Vāyu, and Īśa are those of the intermediate points and those of Gṛhakṣata, Puṣpākhya,[18] Bhallāṭa and Mahendra those of the doors; no assembling should be done there. Pegs and tenons are not to be placed in the locations indicated above.

14. Cf. *Īśānaśiva* (Kriyā. 33.99); that concerns probably pieces whose end is overhanging (such as rafters); their overhanging part is not to be too much heavy.
15. Thus the module is to be used for calculating the tenons and pegs.
16. This is to avoid the coincidence of two centres according to a very general rule (e.g. position of doors).
17. Nirṛtti square (south-west) would be more appropriate, for the three other gods of the series are placed on intermediate points; Rākṣasa is normally to the south (cf. 7.35 and Figs. 5 and 6).
18. Cf. 9.57; here Gṛhakṣata is named in place of Rākṣasa; Puṣpākya = Puṣpadanta.

[66]मध्यार्धमध्यमध्यं च त्यक्त्वा युञ्जीत बुद्धिमान् ।
द्रव्यमध्यस्थसूत्रस्य वामेऽवामे तु दन्तकम् ॥ ५० ॥
द्रव्यविस्तारमध्यस्था शिखा शीघ्रविनाशिनी ।
अन्योन्यसन्धिविद्धं च शिखा कीलस्य वेधनम्[67] ॥ ५१ ॥
धर्मार्थकामसौख्यानां विपत्तिं[68] नित्यमादिशेत् ।
वामदक्षिणयोगेन प्रतिसन्धि परित्यजेत् ॥ ५२ ॥
[69]तारतीव्रान्तरस्थं यत् कल्प्यशल्यमिति स्मृतम् ।
पूर्ववद् विधिना सन्ध्यायाममध्ये तु योजयेत् ॥ ५३ ॥
[70]अज्ञानात् त्वरयानुक्तस्थाने वा योजयेद् यदि ।
सर्वेषामपि वर्णानां सर्वसम्पत्क्षयो भवेत् ॥ ५४ ॥
पुराणैर्न नवद्रव्यैर्न पुराणैर्नवैरपि ।
नवैर्नवानां द्रव्याणां योगो जीर्णैश्च जीर्णिनाम् ॥ ५५ ॥
युक्त्यैव द्रव्यसन्धानं सम्पदामास्पदं सदा ।
विपरीते विनाशाय भवेदेवेति निश्चयः ॥ ५६ ॥
ऊर्ध्वद्रव्याणि सर्वाणि[71] वाजनादीनि यान्यपि ।
सशिखान्यशिखान्येतान्युक्त्या योज्यानि पूर्ववत् ॥ ५७ ॥
पादोपरि भवेत् सन्धिरन्तरे नैव कारयेत् ।
ब्रह्मस्थलोर्ध्वगद्रव्यसन्धानं विपदां पदम् ॥ ५८ ॥
ब्रह्मस्थानस्थितः स्तम्भः स्वामिनश्च विनाशनम् ।
तुलादीन्युपरिद्रव्याण्यत्र दोषो न विद्यते ॥ ५९ ॥

66. C : मध्यार्धमर्धमध्यं; E : मध्यस्य मध्यमध्यं
67. D, E : वेशनम्
68. C : विपत्ति
69. D : omits verses 53 to 56.
70. E : omits 54-55a.
71. C : सार्धाणि

50-51a In the same way, the sage, in assembling, must avoid the (points which are at the) middle or (at) the (first and third) quarters (of the length of the pieces); a tenon is to be placed to the left or right of the median line of a piece; a tenon placed in the middle of a piece brings about sudden death.

51b-52 A tenon placed in the hole intended for a nail or vice-versa will bring about the final collapse of Dharma, Artha and Kāma and of happiness. The joining on the right, of what is to be joined on the left, is to be avoided at all costs.

53a A (peg) placed between the length of a piece and the width of another (?) is called *kalpyaśalya* (?).

53b-54 If an assembly is made as mentioned above, in the middle of a piece or in any forbidden place, this, whether done in ignorance or haste, will mean the end of happiness for people of any class.

55-56 Old pieces should not be joined with new material nor new pieces with old material. The assembling of new pieces is to be done with new material and that of old pieces with old material.[19] When pieces are assembled according to these precepts this will always guarantee success whereas deviation entails failure.

57-58a All the elements above (the pillars), such as the architrave,[20] are to be assembled as indicated above, with or without tenons as the case demands, but this assembly is to be directly above the pillars and not above the intervals (between them).[21]

58b-59 Pieces are not to be assembled above the place of Brahmā for that would be a source of misfortune. A pillar set at the place of Brahmā leads to the death of the house owner but no error is made if upper pieces, such as beams, go above that place [22]

19. A general rule in carpentry is that pegging, nailing and the like is never to be done with re-used pegs, nails . . . etc.

20. *Vājana* is normally applied to the upper fascia of the architrave (cf. 16.5 sq.); however it seems to be used here is a wider sense.

21. That is to say that, for instance, when an architrave is made up from several timber pieces they are to be joined above the pillars, which is quite sensible for having a solid building . . .

22. The Brahmā square is the heart of the *vāstupuruṣa* who is not to be harmed by a peg or anything pointed in the ground (see 7.54).

पुंस्त्रीनपुंसकमहीरुहसन्धिकार्ये
[72]पुंसा च पुंविहितमेव तथैव पुंस्त्री ।
नैवोभयेन च नपुंसकसङ्गमः[73] स्या-
ज्जात्यैकया शुभद उक्तविधिक्रमं वा ॥ ६० ॥
एवं युक्त्या द्रव्यसन्धानयोगं
प्रोक्तं[74] नृणां तैतिलानां निवासे ।
युक्त्या युक्तं सम्पदामास्पद तद्
युक्त्यायुक्तं सर्वसम्पत्क्षयं स्यात् ॥ ६१ ॥
छिद्रं स्वल्पतरं विधेयमधुना दीर्घान्वितच्छेदनं
स्थूलं काष्ठशिलेभदन्तमुदितं निम्नं हि पक्वेष्टकम् ।
पक्वं निर्गमनं सुधाभिरनिशं कुर्यात् तनुत्वं[75] यथा
पूर्वं मानसमुन्नयेत्[76] तदपरं शिल्प्युत्तमः शातधीः ॥ ६२ ॥

इति मयमते वस्तुशास्त्रे सन्धिकर्मविधानो नाम
सप्तदशोऽध्यायः

72. C : पुंसाश्च
73. E : सङ्क्रमः for सङ्गमः
74. C : योगः प्रोक्तो
75. D, E : तनुक्तं
76. D : मानसमन्तयेत्

60 When assembling male, female or neuter woods,[23] those which are male should be joined (with those that are male) and, in the same way, female (with female); on no account should one type be joined with the other. The assembling of neutral ones is to be done with only one of the other types if it is to be a success; it may also be done according to the rules (for male and female ones) given above.

61 It is according to these principles that the assembling of the elements should be done, in a divine or human house; what is joined according to them brings success whereas that which does not accord with them is the ruin of success.

62 The best and exceedingly wise architect is advised to make a small but deep hole; the peg must be of wood, stone or ivory; the mortice (is cut in) a baked brick and the brick is to be made even around its circumference with mortar.[24] Anything that has not been given must be as above and (the architect) must make the assembly so that it will bring perfection to the mind.

Thus ends, in the *Mayamata*, treatise on dwelling,
the seventeenth chapter: RULES FOR JOINERY.

23. Cf. 15.84-85.
24. What is given here seems to be the description of some kind of special assembly; we have not found any parallel to it in cognate texts.

अथाष्टादशोऽध्यायः[1]

[प्रासादोर्ध्ववर्गाः]

गलभूषणमेतेषां शिरश्छन्दमथाधुना ।
[2]लुपामानं च वक्ष्येऽहं स्थूपिकालक्षणं क्रमात् ॥ १ ॥

[गललक्षणम्]

वेदिकाद्विगुणोत्सेधं कन्धरं शिखरोदयम्[3] ।
तद्द्वित्रिगुणतुङ्गं वा वेदिकोच्चं तु वा गलम् ॥ २ ॥
गर्भभित्तित्रिभागैकमङ्घ्रेर्वेद्यङ्घ्रिवेशनम् ।
[4]ग्रीवावेशं ततस्तावदेवं दैवे[5] च मानवे ॥ ३ ॥
पञ्चांशे भित्तिविष्कम्भे भागो[6] वेद्यङ्घ्रिवेशनम् ।
ग्रीवावेशं [7]ततस्तावच्चतुरंशे तथैव च ॥ ४ ॥
एवं त्रिविधनीत्या तु ग्रीवा साध्या[8] प्रयत्नतः ।
उत्तरं वाजनं[9] चैव मुष्टिबन्धं मृणालिका ॥ ५ ॥

1. F : omits verses 1 to 91.
2. D : लम्बमानं
3. E : द्विगुणोदयम्
4. D : ग्रीवावेशं ततस्तस्माद् देवेऽदेवे निकेतने ।
5. A, E : देवे
6. E : भागे
7. D : ततस्तस्मात्
8. A : सास्या; D, E : सन्ध्या
9. A, C : वाजिनं

CHAPTER 18

MAKING OF THE ROOF AND COMPLETION OF THE BUILDING WORK[1]

UPPER LEVELS OF ELEVATION[2]

1 I now present the decorative elements of the attic, the shapes of the roof, the proportions of the rafters and the characteristics of the finial.

The attic[3]

2 The attic proper is twice as high as its stereobate and the height of the roof is double or triple that of the attic. The attic may however be the same height as its stereobate.[4]

3-5a The projection of the pilasters placed against the stereobate, in relation to the pilasters (of the attic), is a third (the thickness of) the wall of the sanctum (at the level of the attic?);[5] the recess of the attic is the same (in relation to its stereobate) whether a divine or a human dwelling is being dealt with but the projection of the pilasters of the stereobate may also be equal to a fifth or a quarter of the thickness of the

1. This chapter deals with upper levels of elevation (see following note) and with consecration ceremony as well as with miscellaneous subjects, such as preparation of coatings and mortars (vv. 92-108 and 112-15) or wall-paintings (vv. 109-11).
2. The three upper levels of elevation (attic, roof and finial) form together an aedicula crowning the temple. This aedicula ('miniature shrine' according to Stella Kramrisch) has a four level elevation with a base (the attic stereobate), a 'level of pillars' (the attic proper), a roof and a finial, both those last being the ones of the temple itself.
3. Cf. *Ajita* 14.64-76, *Śilparatna* chapter 31. The attic, placed above the entablature and below the roof, is recessed in relation to both of them, hence its name of 'neck' (*gala*, *kandhara*, *kaṇṭha*, about these terms which may be applied to any recessed element see Dagens 1984 p.10, 45, 65). One may note that the roof which comes above that 'neck' is often called 'head' (*śiras, śīrṣa, mastaka . . .*).
4. This stereobate (*vedikā*, *vedī*, *vitardi. . .*) has been described in 16.51 sq.
5. *Garbhabhitti*: the attic seems to be assimilated to the level of the pillars of the first storey which corresponds to the external wall of the sanctum (*garbhagṛha*, *nālīgṛha*: see 19.13 sq.).

[10]दण्डिकावलयं चैव गलभूषणमिष्यते ।
मुष्टिबन्धोपरि क्षिप्तव्यालनाटकमूर्ध्वतः ॥ ६ ॥
दण्डिका च विधातव्या तदूर्ध्वे शिखरक्रिया ।

[शिखरभेदाः]

[11]शिखरोत्सेधमात्तोच्चा भागमानवशेन वा ॥ ७ ॥
[12]दण्डिकावधिविस्तारं पञ्चांशं द्व्यंशमानकम् ।
[13]सप्तनन्दशिवांशे तु त्रयोदशतिथौ तथा ॥ ८ ॥
सप्तदशांशके बन्धवेदभूतषडंशकम् ।
[14]सप्ताष्टांशं तु तारार्धमित्यष्टौ शिखरोदयाः ॥ ९ ॥
पाञ्चालं चापि वैदेहं मागधं चापि कौरवम्[15] ।
कौसलं शौरसेनं च गान्धारावन्तिकं[16] तथा ॥ १० ॥
यथाक्रमेण नामानि ज्ञातव्यानि विचक्षणैः ।
जघनाद् बहिरेवैते एकाः[17] सर्वे समाहिताः ॥ ११ ॥

10. E : दण्डकावलयं
11. D : शिखरोत्सेधमानश्च भागोत्सेधवेशेन वा
12. E : दण्डिवावायविस्तारं
13. D : सप्तनन्दा च रुद्रस्तैः त्रयोदश त्रिधौ तथा
14. D : सप्ताष्टांवशकृतारार्धं
15. D : रौरवः
16. D : गान्धाराङ्गवकं
17. D, E : भागः for एकाः

wall and it will then be the same for the recess of the attic. The attic is to be calculated with precision, according to one of these three sets of proportions.

5b-7a The decorative elements of the attic are the architrave and its upper fascia, the fist-moulding (*muṣṭibandha*), the braces (*mṛṇālikā*), the consoles (*daṇḍikā*) and the lierne (*valaya*).[6] Above the fist-moulding are *vyāla* and dancing figures attached (to the upper elements) from the top down. The arrangement of the consoles depends upon the shape of the roof just above them.

Different types of roof[7]

7b-11a The height of the roof may be determined in the manner given above but may also be proportional to the distance between consoles:[8] it is two-fifths, three-sevenths, four-ninths, five-elevenths, six-thirteenths, seven-fifteenths, eight-seventeenths or a half of it; these are the eight possible heights for the roof and here are the corresponding names, as

6. The decorative elements placed above the pilasters of the attic form a kind of entablature; they correspond to the lower part of the entablature proper (see 16.5 sq.) up to the lierne (*valaya*); above that last the cornice (or dripstone) is here replaced by the roof.
7. *Śikhara* (*śiras*. . . etc., see above note 3) designates the fifth level of elevation; that 'roof' may be a timber-roof of any form or the image of the extrados of such a timber-roof sculptured on a massive stone structure. In South India temples with true timber roofs are found only in Kerala; elsewhere, the 'roof' is no more than the decoration of the top of building superstructure. The lengthy description given in *Mayamata* (vv. 7-82) is that of the timber work which supports the roofing of a true timber roof. This description which seems to rely on a Kerala tradition, presents lots of difficulties. We have not been able to understand the meaning of several technical terms found here (*puṣkara*, *malla*, *cūlikā*, *jānu*. . .) and have been compelled to leave several blanks in our translation. Amongst the other treatises, some give descriptions very similar with that one and no more clear (e.g. *Kāmika* I. chapter 57 or *Śilparatna* chapters 31-32); others use a slightly different technical vocabulary, quite similar to the one used nowadays in Kerala (e.g. *Manuṣyālayacandrikā* 6-7 or *Vāstuvidyā* chapters 10-11). For the sake of comparison Figures 13 and 14 give the vocabulary used by a traditional architect from Kerala to describe the timber work of a small four pillar pavilion and of a temple gateway (see p. LXI-LXII).
8. *Daṇḍikāvadhivistāra*: the consoles (see 16.9b-10a) support the lower part of the rafters (*lupā*, below note 10); thus the distance between the extremities of the consoles of two opposite sides of the building corresponds to the width of the roof (see also below 18.23).

[18]सर्वे ते तैतलानां स्युरर्धादधस्तु मानुषम् ।
[19]तद्दशाद्यासप्तदशभागादेकांशवर्धनात्[20] ॥ १२ ॥
आवन्तिका[21] प्रभृत्यूर्ध्वमष्टाविष्टलुपोदयाः[22] ।
[23]व्यामिश्रं च [24]कलिङ्गं च तथा कौशिकमेव च ॥ १३ ॥
[25]वराटं द्राविडं चैव बर्बरं कोल्लकं पुनः ।
तथा [26]शौण्डिकमित्येते व्यामिश्रादिलुपोदयाः[27] ॥ १४ ॥

[शिखराकृतिः]

[28]देवानां प्रथितान्येव पाषण्ड्याश्रमिणामपि[29] ।
चतुरश्रं च वृत्तं च षडश्राष्टाश्रमेव च ॥ १५ ॥
द्वादशाश्रं द्विरष्टाश्रं पद्मकुड्मलसन्निभम्[30] ।
तथामलकपक्वाभं[31] दीर्घवृत्तं[32] च गोलकम्[33] ॥ १६ ॥
[34]अष्टाश्राद्यष्टधाराणि हर्म्यादीनां शिरांसि हि ।
[35]षडाद्याषष्टिकर्णं च सम्मतं शिखराकृतिः ॥ १७ ॥

[स्थूपिकोत्सेधः]

[36]तदुच्छ्रयचतुष्पञ्चभागं स्यात् पद्मतुङ्गकम् ।
[37]तत्समोच्चत्रिभागा वा तदूर्ध्वे स्थूपिकायतिः ॥ १८ ॥

18. A, B, C, D, E : सर्वाणि
19. D : तदाद्या; C : तद्दशाद्याः
20. E : एकविवर्धनात्
21. A : प्रश्रयति; C : प्रश्रयत; D : प्रहुति
22. A : इष्टयलुपोदयाः
23. D : व्यादिश्रं
24. D : कलङ्गं
25. D : वृद्धाश्र
26. E : दण्डिकमित्येते
27. B : व्यामिश्राविलुपोदयाः
28. A (var) : देनानां प्रथितानां च तापसाक्षमिणामपि
29. B : पाषण्डाश्रमिणामपि
30. D : पद्मकुमुदसन्निभम्
31. C : पद्माभं; D : पत्रं वा
32. D : ग्रीवं वृत्तं
33. D : कोमलम्; E : गोलकम्
34. A, B : अष्टार्गष्टधराणि; A (var), B. (var), E : अष्टाद्यष्टाष्टधाराणि ; D : अष्टाद्यष्टाष्टमश्राणि
35. D : षट्षडाद्या षाष्टिकर्णं
36. D : omits 18a.
37. E : तत्समोच्चार्धभागो

are known to learned ones: *pāñcāla*, *vaideha*, *māgadha*, *kaurava*, *kausala*, *śaurasena*, *gāndhāra* and *āvantika*.[9]

11b-12a With the exception of the smallest, all these types are suitable for gods and, save for that (whose height) is equal to half (of the distance between the colsoles), for men.

12b-14 The eight heights for rafter work[10] corresponding to these roofs, the first of which is *āvantika*, go from eleven tenths to eighteen seventeenths (of the height of the roof proper). Here are the names which correspond to these eight heights of rafter works, the first being *vyāmiśra*: *vyāmiśra*, *kalinga*, *kauśika*, *varāṭa*, *drāviḍa*, *barbara*, *kollaka* and *śauṇḍika*.[11]

Roof shapes[12]

15-16 The roofs (of buildings) intended for gods and for heterodox sects may be in the following shapes: square, circular, hexagonal, octagonal, dodecagonal, sixteen-sided or in the shape of a lotus but or of a myrobolan fruit or they may be elliptic or spheric.

17 The roofs of palaces have at least eight sides and eight faces but roofs may also have from six to sixty faces (?).

Height of the finial[13]

18-19 The height of the lotus (which is at the summit of the roof) is a quarter

9. Similar series of names with geographical consonance are found in *Śilparatna* (32.4) and *Īśānaśiva* (Kriyā. 31.70-71).

10. *Lupā* (also *raśmi*, cf. 25.203 sq.) are the main rafters; they repose at the top on a ridge beam (*vaṃsa*, in the case of a saddleback roof, see Fig. 14) or on a newel (*kūṭa*, in a pyramid or circular roof, Fig. 13); in the case of a hipped roof (common in Kerala for temple gateways) there is a newel at both ends of the ridge beam (cf. *Vāstuvidyā* comment. apud 10.1). As indicated below (vv. 30-31) rafters may get different names according to their position in relation to the corners of a pyramid or a hipped roof. J. Dumarçay has done a lot for the elucidation of some passages of this chapter in his article "Les charpentes rayonnantes sur plan barlong ou carré dans l'Asie méridionale" (*Bulletin de l'Ecole Française d'Extrême-Orient*, vol. 60, 1973, pp. 85-104).

11. Similar list in *Śilparatna* 32.6-7.

12. See also 19.3-4.

13. *Sthūpikā* (*stūpikā*:) the finial is the sixth level of elevation; for its description see below vv. 83 sq. and 19.15-17.

[38]अल्पीयसी शिरोर्धा वा भागोच्चा वा त्रिभागिके ।
सङ्क्षेपात् स्थूपिकाभूषा[39] ह्युपरिष्टात् प्रकाश्यते[40] ॥ १९ ॥

[लुपासंख्या]

पञ्चाद्येकादशान्ताश्च चतुराद्या दशान्तकाः ।
चतुर्विधा लुपासंख्या देवेऽदेवे[41] निकेतने ॥ २० ॥ ।

[पुष्करम्]

पूर्वोक्तं ह्यन्तरोच्चं[42] तु व्यामिश्रं नाम पुष्करम् ।
ऊर्ध्वस्थान्यप्यधस्थानि[43] पुष्कराण्यर्धमानतः ॥ २१ ॥
अर्धमारभ्य संवर्त्य पश्चादुक्तोच्चसीमयुक् ।
आरोह्याण्यवरोह्याणि गुह्यमेतदुदाहृतम् ॥ २२ ॥

[लुपामानम्]

दण्डिकावधि [44]तारार्धं चतुरश्रीकृतं समम् ।
कोष्णीषासन[45]सीमाख्यसूत्रयुक्तं खलं नयेत् ॥ २३ ॥
दण्डिकोत्तरबाहुल्यं सूत्रयेदासनादधः[46] ।
आसने चतुरंशाद्यादशांशं बिन्दु विन्यसेत् ॥ २४ ॥

38. D : अल्पं यत् सशिरोच्चार्धं भागोच्चौ वा त्रिभागिकैः
39. D : कीलं instead of भूषा
40. D : प्रकथ्यते
41. E : दैवेऽदेवे; C : देवैदेवे
42. A, C, E : ह्यन्तरोच्चं; D : द्वन्द्वारोच्चं
43. D : अपृथस्थानि for अप्यधस्थानि
44. A, B, C, E : कारार्धं
45. E : भीमा- for सीमा-
46. D : सूत्रयुक्तानलादध

or a fifth that of the roof.[14] Above is the finial, whose height is equal to that of the lotus or to a third of it. In the case of a very small (building) however the height of the finial is half or a third that of the roof. The elements of the finial will be briefly indicated below.

Numbers of rafters

20 There may be five, (seven, nine or) eleven rafters or there may be four, (six, eight or) ten; these are the four numbers possible for divine and human dwellings.[15]

Puṣkara (?)

21-22 The interior height given above is that of the *puṣkara* (?) named *vyāmiśra*.[16] *Puṣkaras* are set above or below the middle (of the roof? of the rafters ?). Starting with a half (of that height ?) and proceeding up to the maximum height, they are to be set upward and downward (?). This is a secret which has been disclosed.

Dimensions of rafters[17]

23 A square area is marked out, the width of which is half of the distance between consoles[18] and which is delimited by lines called *ka*, *uṣṇiṣa*, *āsana* and *sīma*.

24 Below the *āsana* line a parallel one is drawn at a distance equal to the projection of the consoles in relation to the architrave (of the attic). Points are placed on the *āsana* line, which divide (it) into four (five, six, seven, eight, nine or) ten parts (according to the number of rafters ?).

14. This 'lotus' seems to be different from the finial lotiform base (see below note 30); it may be an intermediate element between the top of the roof and the finial for which it plays the role of a support.

15. Even and odd series are considered as parallel ones, thus the number given is 'four' for the eight of them.

16. We do not know what are those *puṣkara* (see also v. 29); *vyamiśra* is a name of rafters (above vv. 13b-14), however it does not seem possible to consider those elements which "are to be set upward and downward (*ārohyāṇy avarohyāṇi*)" as rafters.

17. See Fig. 12 (p. LX). A clearer exposition of the method to calculate the dimensions of rafters is given in *Vāstuvidyā* (chapter 10 and commentary). Fig.12 has been established with the help of J. Dumarçay's article quoted above (note 10).

18. See above note 8.

कोष्णीषसन्धेस्तद्विन्दु[47] सीमच्छायोच्चमावहेत् ।
[48]छायोच्चायतमानानि [49]कमूलादासने न्यसेत् ॥ २५ ॥
तान्येव दण्डिकादीनां पर्यन्तानि भवन्ति हि ।
कोष्णीषसङ्गात् पर्यन्तबिन्द्वन्तं तल्लुपायतम् ॥ २६ ॥
तत्तत्पर्यन्तविस्तारं [50]कसूत्रे विन्यसेत् पुनः ।
स्वस्वकर्णगतच्छायामानैः सर्वान् [51]विमानयेत् ॥ २७ ॥
तत्तत्पर्यन्तसूत्राणि मल्लपर्यन्तसूत्रवत् ।
एवं मध्य[52]लुपा[53]सीम्नो वर्धन्ते वर्णसंख्यया ॥ २८ ॥
[54]एवमावर्त्य तत्पश्चादारोह्यैवावरोह्य[55] च ।
तत्तत्पुष्करसञ्जातं तत्त[56]न्मल्लायतं विदुः ॥ २९ ॥

[पञ्चलुपाभेदाः]

समध्यं [57]च विमध्यं च [58]लुपाकलनमेव हि ।
मध्यं च मध्यकर्णं चाप्याकर्णमनुकोटिकम् ॥ ३० ॥
कोटिरित्येवमुच्यन्ते पञ्च वर्णलुपाः क्रमात् ।
युग्मांशेऽयुग्मसंख्याभिरयुग्मे युग्मसंख्यया ॥ ३१ ॥
[59]कान्तान्तरासिकोष्णीषसीमान्तं स्वांशसंख्यया ।
चूलिका [60]भ्रमणीया हि समयासमया च सा ॥ ३२ ॥
तत्तत्सूत्रात् स्थिता[61]दन्तस्तनसूत्राणि सूत्रयेत् ।
[62]शयितसूत्रादधः पृष्ठवंशसूत्राणि सूत्रयेत् ॥ ३३ ॥

47. E : सीम्नश्चापीच्चम्
48. D : छायोछायातमानानि तन्मूलादासनान्यसेत् ।
49. E : तन्मूलाद्रासनं
50. C, E : तत् सूत्रे
51. E : समापयेत्
52. D : लम्पासीमे
53. E : सन्नो वर्धते
54. A (var) : एवमावर्त्त तत्; D : एवमावर्त्तते
55. E : आरोह्यं वावरोह्य
56. E : मल्लयुतं
57. D : नसमध्यं च
58. D : लुपाकवनम्; E : युक्त्या कालत्रम्
59. D : कान्ताराान्तरसी
60. E : भ्रमणेयापि
61. E : अन्तस्थानसूत्रं सूत्रयोः
62. D : शैतसूत्रादथ स्वष्टवंशनीत्राणि सूत्रयेत्

25-26 Starting from the intersection of *ka* and *uṣṇiṣa* and passing through these points, lines are drawn up to the limit of the overhanging eave (*chāyā*) (which is marked by the parallel traced below the *āsana* line). Next, the distances up to the eave (?) are drawn on the *āsana* line starting from (the end of this line which goes plumb to) the base of the *ka* line; this gives the positions of the extremities of consoles. The length of each rafter is the distance between the intersection of *ka* and *uṣṇiṣa* and the extreme point (corresponding to this rafter).

27-28a Each of the extreme distances (?) is then drawn again on the *ka* line (?) and all (?) should be measured with the corresponding hypotenuse going up to the eave (?). Each of these extreme lines corresponds to the extremity of a *malla* (?).[19]

28b-29 Thus the dimensions (?) of the median rafter are increased according to the number of the other rafters (?). When this has been done, the lengths of the corresponding *malla* are obtained by a process of increase and decrease; it is known that these *malla* are taken from the corresponding *puṣkara* (?).

The five categories of rafters

30-31 Rafters are arranged in the centre or off-centre. Five specific rafters are called, in order: median (*madhya*), *madhyakarṇa*, *ākarṇa*, *anukoṭi* and corner-rafter (*koṭilupā*).[20] (The *āsana line*) is divided into an even number of parts when their number is odd and into an odd number when it is even.

32-35 [*This deals with the way to install rafters for a saddle-back roof (or for a wagon-roof?), between a ridge beam* (pṛṣṭhavaṃśa) *and a wall plate(?)*]

19. *Malla*: we do not understand which elements are so designated; they appear to be connected with *puṣkara* (see above note 16 and below v. 29).

20. The text deals here with the radiating rafters of a pyramidal or hipped roof. In the *Vāstuvidyā* (chapter 10), two kinds of such rafters are distinguished: *prakṛtilupā* placed in the centre and *vikṛtilupā* which are off-centre; the first ones correspond to the *madhyalupā* of the *Mayamata*; the others are the corner-rafters (*Mayamata: koṭilupā*) and the intermediate ones (*madhyakarṇa, ākarṇa* and *anukoṭi*). The term used in the *Mayamata* to designate the corner-rafters (*koṭilupā*) seems to correspond to Tam. *kōṭikai* used now a days with the same meaning by Tamil traditional carpenters.

[63]शयितस्थितसूत्रान्तः कीलं तत्कूटमूर्धनि ।
निधायार्धेन्दुवत् [64]सर्वाश्चूलिका विलिखेत् समाः[65] ॥ ३४ ॥
[66]लुपाविलुपमध्यान्तर्गता [67]सा चूलिकाकृतिः ।
एवं स्याद् ऋजुकार्यं हि तथा कुक्कुटपक्षवत् ॥ ३५ ॥
बालकूटस्य विस्तारस्थितसूत्रस्तनान्तरे[68] ।
कूटमध्यमसूत्रं तु [69]वलयच्छिद्रमध्यगम् ॥ ३६ ॥
पर्यन्तसूत्रकादन्तर्दण्डिकोत्तरजा ततिः ।
[70]तदन्तर्जानुकव्यासस्तदन्तश्चूलिकास्थितिः ॥ ३७ ॥

[शिखरावयवमानानि]

[71]लुपातारं तु दण्डं वा सपादं सार्धमेव वा ।
[72]विस्तारत्रिचतुष्पञ्चभागैकांशं तु तद्घनम् ॥ ३८ ॥
जानुव्यासं [73]चोत्तरार्धचूलिकार्धार्धमेव वा ।
दण्डिकाविपुलं तावत् त्रिपादार्धं तु तद्घनम् ॥ ३९ ॥
[74]वलयं जानुनीव्रं च दण्डिकाविपुलार्धतः ।
मल्लमध्यादि[75]चामीली(?) जानुकालम्बनं च यत् ॥ ४० ॥
पर्यन्तजानुकान्तं च [76]चूलिकाभाग एव सः[77] ।
[78]शयनात् तावदेव स्यान्नीव्रालम्बनसूत्रकम्[79] ॥ ४१ ॥

63. D : शैतं तत्सूत्रान्तं कीलं; E : शयितं तर्जितं सूत्रकीलं
64. C : सर्वा चूलिका
65. D : क्रमात्
66. D : अर्धहस्तात्तु चन्द्रं वा मध्यमध्यान्तशतासा(?) ।
67. E : स्युः
68. E : स्तनान्तरम्
69. D : वलयश्चन्द्रमध्यमम्; E : वलयच्छत्रमध्यगम्
70. D : तदन्तजीत-
71. D : लुपामानं; E : लुपान्तरं
72. A (var), E : विस्तारस्त्रि-; D : विस्तारास्त्रि-
73. E : चोत्तराग्रमाळिका-
74. D : omits 40a; A, B, C, E : वलयं जानुनीप्रं
75. D , E : चामीलि
76. D : चूलिकाव्यास
77. E : हि
78. D, E : शयनं
79. A, B : त्रिपालम्बनसूत्रकम्; E : तीव्रलम्बनसूत्रकम्

36-37 [*This deals with the newel* (kūṭa) *of a pyramid roof and with other elements such as* cūlikā *(?) and* jānu *(?).*]

Dimensions of roof elements

38 The width of the rafters is one, one and a quarter or one and a half modules; their thickness is a third, a quarter or a fifth their width.

39-40 The width of the *jānu* is half that of the architrave or a quarter that of the *cūlikā* (?); their thickness is equal to the length of the consoles (*daṇḍikā*) or it is three quarters or half of it. The lierne (*valaya*) and the edge of the *jānu* make up more than half the length of the consoles . . . ? . . . the overhang of the *jānu* . . . ?

41-45 [*This deals with various elements and mentions a* kuṭhārikālalāṭa[21] *which seems to be the gable of a porch (?)*].

21. See below vv. 78 sq.

कुठारिकाललाटं च जघनं च समं मतम्[80] ।
पादविष्कम्भकर्णो[81] वा विष्कम्भद्विगुणोऽथ वा ॥ ४२ ॥
कूटव्यासो लुपापिण्डी कर्णस्तद्द्विगुणायतः ।
तदर्धं [82]नालिकालम्बमूर्ध्वे मल्लाग्रसङ्गतिः ॥ ४३ ॥
[83]छिद्रं तत्तीव्रमात्रं स्यान्मल्लानां तु प्रवेशनम् ।
जानुकं च लुपामध्यं मध्यपृष्ठस्थवंशकम्[84] ॥ ४४ ॥
समं स्यात् [85]तीव्रताराभ्यां [86] चूल्यंशो वा लुपान्तरम् ।
लुपातीव्राष्टगुणं [87]वा वलयो वंशविस्तरः ॥ ४५ ॥

[छादनम्]

तदर्धं वेशनं [88]तीव्रं फलकैर्लोहलोष्टकैः ।
मृण्मयैस्तु यथास्थैर्यमिच्छया छादयेत् पुनः ॥ ४६ ॥
लुपोर्ध्वे फलकान् न्यस्य वाष्टबन्ध[89]मधोर्ध्वतः[90] ।

[वलयसन्धिः]

[91]लुपामध्यादधश्छिद्रं वलयस्य विधीयते ॥ ४७ ॥
क्रियायां परलेखास्तु कल्प्याः षोडशसंख्यया ।
कुक्षिव्यासाष्टभागैकं [92]मात्रामानमिति स्मृतम् ॥ ४८ ॥
तेन भागेन [93]सप्तार्धाद् द्व्यर्धभागविवर्धनात् ।
आपञ्चदशसंख्यान्ताः[94] परलेखास्तु षोडश ॥ ४९ ॥

80. E : समात्मकम्
81. D : कण्ठौ
82. E : नालका-
83. D : चिप्रं तत्रीव्रमात्रं; E : सत्रातनीव्रमात्रं
84. E : मध्यऊर्ध्वस्थवंशकम्
85. D, E : नीव्र-
86. E : चूलितो वा
87. D : यावद् वलयो वशविस्तारा
88. D : नीव्रं
89. D : अथोचिते
90. D and E add between 47a and 47b :
D : चतुर्विंशति निक्षिप्यश्चाथ ऊर्ध्वे ततो विदुः ।
छादयेल्लोहलोष्टैश्च बन्धयेदष्टबन्धकैः ॥
E : आलिप्य च धनुर्विंशति . . . क्षिप्यं च तदूर्ध्वतः ।
छादयेल्लोहलौष्टैर्बन्धयेदष्टबन्धकैः ॥
91. D : लुपामानतदधश्छिद्रं बलमूह्य विधीयते ।
92. E : मात्रमानमिति
93. C : सप्तार्ध-
94. C : संख्यास्ताः; D : संख्या सुः

Roofing[22]

46-47a ...?... Roofing is done with planks and metal sheets or with tiles, the choice being made according to the degree of solidity required; planks are laid above the rafters with *aṣṭabandha* mortar above and below (?).

Fixing of the lierne

47b-48a The holes for the lierne (*valaya*) are pierced below the middle of the rafters. To do this, sixteen *paralekhā* (?) are to be prepared (?).

48b-55 [*This deals with the drawing of* paralekhā *which should be done on the same square figure as the drawing of the rafters (see above)*].

22. See below v. 108. About *aṣṭabandha* cf. K.M. Varma, *The Indian Technique of Clay Modelling*, 1970, pp.11 sq.

[95]लुपाध ऊर्ध्वबिन्द्वादि मध्ये विन्यस्य तद्विधिम् ।
तद्बिन्द्वादि [96]विलोक्या हि परलेखा विचक्षणैः ॥ ५० ॥
[97]प्रासादानामिमाः प्रोक्ता गृहादीनां च षोडश ।
लुपायामाद्याद्विगुणं तन्मानं तेन बुद्धिमान् ॥ ५१ ॥
कोष्णीषासन[98]सूत्राभ्यामधः [99]शफरमालिखेत् ।
तस्मादुपरि मल्लस्य लेखयेत् तद्विचक्षणः ॥ ५२ ॥
[100]मल्लायतादधोभागे त्रिः[101]पञ्चांशीकृतेः क्रमात् ।
[102]तत्तदंशावसानं तु मत्स्यं तत्तत् समुल्लिखेत्[103] ॥ ५३ ॥
[104]सर्वासां परलेखानां क्रमोऽयं परिकीर्तितः ।
पाञ्चालादिलुपानां च प्रत्येकं प्रोच्यते बुधैः ॥ ५४ ॥
[105]ऋजाकार्ययुता मल्लाद् या लेखासनकाग्रयोः ।
मध्ये परं हि सा प्राज्ञैः [106]परलेखा प्रकीर्तिता ॥ ५५ ॥

[घटिका]

लुपाबाहुल्यमानेन [107]घटिकां चतुरश्रिकाम् ।
[108]वितस्त्यायामिनीमृज्वीं कृतमध्यमसूत्रिताम् ॥ ५६ ॥
[109]चूलिकान्तर्वर्णलुपातिर्यक्[110]सूत्रस्वमध्यमात् ।
विन्यस्य घटिकां पश्चाच्छिन्नां शमनसूत्रवत्[111] ॥ ५७ ॥

95. C : omits 50-54a.
96. E : विलेख्यादि
97. E : प्रासादीनाद्या
98. D : सीमख्याम्
99. D : च परमालिखेत्
100. D : मल्लायतं ततो भागे त्रिवह्नयांशहुते क्रमात्
101. E : पञ्चांशे कृते
102. D : तत्तन्मृदंशावसनं; E : तत्तदङ्गावसानं
103. E : समल्लके
104. D : सर्वेषां; E : सर्वथा
105. D : निलकार्ययुकं
106. E : परलेखातिकीर्तिता
107. C : घटिका चतुरश्रिका; D : पट्टिका चतुरश्रता; E : कटिका वतुरश्रिता
108. D : वितस्यामिनिमृज्वी तु
109. E : चूलिकान्तलुपातिर्यग्वर्णसूत्रस्य मध्यमम् ।
110. D : सूत्रस्य
111. D : शयनसूत्रवत्

56-64 [*This deals with several elements amongst which is the* ghaṭikā *a square piece which seems to be placed in relation to the lierne and the gable*].

प्रतिवर्णं तु घटिकां [112]तद्वर्णे तां निधापयेत् ।
क्षिप्तसूत्रस्य [113]शेषांशच्छिन्ने वर्णलुपोदरे ॥ ५८ ॥
[114]दण्डिकोत्तरवलयस्थितसूत्रसमं लिखेत् ।
उदरायाममध्ये तु [115]लिखिते [116]ककरं भवेत् ॥ ५९ ॥
[117]घटिकाललाटमध्यं [118]ककरं च समं यथा ।
तथा निधाय घटिकां लुपोदरवशायताम् ॥ ६० ॥
तल्ललाटकृतिच्छेद्या वलयाद्या लुपोदरे ।
इष्टपार्श्वे क्षिपेच्छायां [119]छिद्रैश्च वलयस्य तु ॥ ६१ ॥
[120]तत्तद्घटिकया [121]तत्तन्मध्यसंहितमध्यया ।
[122]या ललाटगतच्छाया तासां तासां तु सा भवेत् ॥ ६२ ॥
[123]दण्डिकावलयच्छिद्रस्तनजानूत्तरादिषु ।
[124]शिरोमध्येऽर्धमध्ये च न्यसेन्मुण्डतुलोपरि ॥ ६३ ॥
[125]विटभागशिखोपेततुलापादः सवंशहृत्[126] ।
[127]सवर्णा मत्स्यबन्धाश्च खर्जूरपत्रसन्निभाः ॥ ६४ ॥

[पुनश्छादनम्]

[128]सवलयक्षो विधातव्या [129]लुपाः शिखरकान्तरे ।
लुपोर्ध्वे फलकं वोर्ध्वे तस्याः कम्पं निधाय च ॥ ६५ ॥

112. C : तद्वर्णे तान्; E : तद्वर्णेन
113. E : शेषं चाच्छन्न
114. E : दण्डिकोत्तरयं ह्वेव स्तनसूत्रं समं लिखेत्
115. E : लिख्यते
116. D : कृक्करं
117. E : कटिकालातमध्यं व
118. D : कृक्करं
119. E : छिद्रे
120. D : तत्तद्घटिकास्तन्मध्ये सहितं मध्यमे यथा
121. E : तत्तत्मध्यमाहित-
122. D : याललाङ्गतच्छायातासां त्वथवा भवेत्
123. The end of the chapter is missing in D.
124. E : शिखरे मध्यमध्यं च न्यसेत् कर्णं तुलोपरि
125. E : विरपाहिशिरोपेतं तुलापादस्सवंशभृत् ।
126. A (var) : सवंशहृत्; C : सवंसकम्
127. E : स्वर्णमध्यबलाश्वकाजक्षस्त्रदसन्निभा
128. A, E : स्वलयक्षो; B : स्वलस्थो
129. E : लुप-

Roofing (cont.)

65-66a The rafters, together with the *valayakṣa* (?)[23] are put in place inside the roof. Planks or roofing strips (*kampa*) may be placed above the rafters; the roofing proper is then to be done with bricks and mortar.

23. *Valayakṣa*: a similar term (*valakṣā*) appears in the description of *sabbā*, but its meaning is not clear (cf. 25.208 sq.).

[130]इष्टकासुधया वाऽपि प्रच्छादनमलङ्क्रियात् ।

[स्थूपिकाकीलम्]

स्थूपिकाकीले दीर्घं[131] [132]च पादोत्सेधसमं मतम् ॥ ६६ ॥
अर्धार्धमग्रविस्तारं दण्डार्धं मूलविस्तृतम् ।
आशङ्कुमूलमुण्डान्तं तस्य मूलस्य वेधनम् ॥ ६७ ॥
वंशाधस्तान्निधातव्या [133]मण्डनागाग्रपट्टिका ।
बालकूटस्तनं शङ्कुमूलमुण्डकमेव च ॥ ६८ ॥
अन्तःस्थवलयं वर्णपट्टिका च सनालिका ।
[134]मत्स्यबन्धनखर्जूरपत्रमल्लनिबन्धनात् ॥ ६९ ॥
[135]वलक्षस्वस्तिधाराभिः [136]शिखरान्तरलङ्क्रियात् ।
विस्तारो [137]मुखपट्ट्याश्च [138]दण्ड्यो वाध्यर्ध एव वा ॥ ७० ॥
[139]नीप्रं षडष्टभागं वा कर्णिकोच्चं तु तत्ततिः ।
शक्तिध्वजस्य मूलस्य विपुलं दण्डमानतः ॥ ७१ ॥
[140]तत्कण्ठं तावदेवोच्चं सपादं सार्धमेव वा ।
[141]ग्रीवान्तगग्रपत्रं तु स्तम्भव्यासार्धतुङ्गवत् ॥ ७२ ॥
द्विदण्डादित्रिदण्डान्तमन्तरं गग्रपत्रयोः[142] ।
वाताहतचलच्चारुलतावत् कर्णिकाक्रिया ॥ ७३ ॥
अर्धकर्णमधस्तस्माच्छिरोऽर्धार्धेन चानतिः ।
ग्रीवोपरि [142bis]कपोलान्तं त्रिदण्डं सार्धमेव वा ॥ ७४ ॥

130. E : इष्टकाया सुधाया वा
131. A : कलिदीर्घं
132. E : च पादोत्सेध-; A, B, C : चैवोक्तोत्सेध-
133. E : मण्डतालिङ्गपट्टिका
134. E : मत्स्यबन्धनविज्ञरपत्रमल्लनिबन्धनम्
135. E : वलय-
136. E : शिखरान्ताद्
137. A, B : मुखपद्याश्च; E : मुखपट्टी च
138. C : दण्डो
139. E : तीव्रं षडष्टभागं वा कण्ठिकोच्चं तु तन्त्रिभिः
140. E : तत् कर्णं तावदेवं स्यात्
141. C : ग्रीवान्तं गग्रपत्रं; B : ग्रीवान्तगाग्रपत्रं; E : ग्रीवान्तदग्रपत्रं
142. C : अन्तरङ्गाग्रपत्रयोः; E : अन्तरङ्गात्र पत्रयोः
142bis. E : कपोतान्तं

The axis of the finial

66b-67 The length of the finial's axis is equal to the height of the pillar (of the upper floor?); its diameter, at the top, is a quarter (of a module) and is one module at the bottom.[24] The mortice on which its bottom is (to be placed) goes from the bottom of the *śaṅku* (?) to the top of the roof (? *muṇḍa*).

68-77 [*This deals with the setting up of the finial's axis, then with the internal arrangement of the roof and probably with some decorative features*].

24. See below v. 121 sq. where a different set of dimensions is given.

तावच्छक्तिध्वजान्तं स्यात् सपत्रं वा सशूलकम् ।
नेत्रसंश्लिष्टमल्लं तु चूलिकास्तनमण्डलम् ॥ ७५ ॥
शयितस्थितपट्टाभ्यां मृणाल्यादिविभूषितम्[143] ।
अर्धकर्णोर्ध्वपट्टोर्ध्वप्रत्यूर्ध्वे मुष्टिबन्धनम् ॥ ७६ ॥
यथोशोभननिष्क्रान्तं [143bis]त्रिमुखं स्यात् तदूर्ध्वतः ।
शूलाभं मतलाभं वा सव्यालं वा सनाटकम् ॥ ७७ ॥

[ललाटभूषणम्]

तदूर्ध्वे कूटकोष्ठादिमण्डितं स्याद् विमानवत् ।
सपट्टक्षुद्रकम्पाङ्गं मध्यतोरणमेव वा ॥ ७८ ॥
तोरणाभ्यन्तरे लक्ष्मीः साभिषेकाम्बुजासिका ।
एवंविधैरथान्यैश्च मण्डनीया ललाटिका ॥ ७९ ॥
ललाटवंशसंविद्धमध्यशूलदृढीकृता ।
स्तम्बविस्तारविस्तीर्णा विधातव्या कुठारिका ॥ ८० ॥
तत्कर्णे [144]पत्रमकरं मण्डितं चावलम्बितम् ।
अर्धकर्णेन चार्धं वा यथायुक्ति यथारुचि ॥ ८१ ॥

[स्थूपिका]

[145]अन्तर्गतलुपातिर्यगग्रबन्धनविष्टकम् ।
तदूर्ध्वे [146]तेन निर्विद्धं स्थूपिका[147] यूपमिष्यते ॥ ८२ ॥

143. E : विभूषणम्
143bis. E : त्रिमुखं
144. B : पत्रमकर-; C : पत्रमकरैर्
145. E : अन्तच्छपतिर्यकग्रबलनमिष्टकम् ।
146. E : केन नच्छिद्रं
147. E : रूपम् for यूपम्

Decoration of the porch gable[25]

78-79 Above (the gable of the porch) are square and elongated aediculae,[26] as on the temple itself. (The pediment) is made up of transoms and uprights[27] or else it comprises a central arch in the middle of which Lakṣmī (is figured) seated, sprinkled (by elephants) and holding lotuses. The gable is to be decorated as given here or in some other fashion.

80-81 The *kuṭhārikā* (?) is to be put in place; it is strengthened by a one module wide tenon that pierces the beam (?) of the gable. At its corners are overhanging decorations of foliage and *makara* or else these are at its centre or halfway between the centre and the corners, according to circumstance and to the appearance desired.

The finial[28]

82 The (crowning) bricks are on the upper assembly of intersecting rafters (?); above, and piercing them, should be the finial's axis.[29]

25. *Lalāṭa*: the meaning 'gable' seems to be confirmed by the presence of an image of Gajalakṣmī.
26. *Kūṭa, koṣṭha*: cf. 19.33-34 and note *ad loc.*
27. *Sapaṭṭakṣudrakampāṅga*: it must be something like the latticed windows described in chapter 16 (v. 56 sq.).
28. See also 19.15b sq.
29. About 'crowning bricks' see below vv. 116 sq.

पूर्वोक्तं स्थूपिकामानमलङ्कारमथोच्यते ।
सार्धमर्धं तदूर्ध्वेऽर्धमर्धमशं शरांशकम् ॥ ८३ ॥
अंशमर्धं च भागं स्यादर्धमंशं तथार्धकम्[148] ।
भागमर्धं तथार्धांशमंशमर्धं यथार्धकम् ॥ ८४ ॥
चतुरर्धं क्रमेणैवोत्तुङ्गे द्वाविंशदंशके ।
पद्मं च क्षेपणं वेत्रं क्षेपणं [149]पङ्कजं घटम् ॥ ८५ ॥
पङ्कजं क्षेपणं धृक् च क्षेपणं वेत्रमूर्ध्वतः[150] ।
क्षेपणं धृक् च कम्पं तु पद्मं फलकमम्बुजम् ॥ ८६ ॥
वेत्रं च मुकुलं चैव क्रमेणोक्तवशान्नयेत् ।
[151]सप्तद्व्यंशत्रिकद्व्यंशैः पञ्चनन्देन्द्रियत्रिकैः ॥ ८७ ॥

148. C : तथांशकम्

149. B : पद्मजं

150. B : नेत्रमूर्ध्वतः

151. E : सप्तत्र्यंशत्रिकद्व्यंशैर्पञ्चनन्दैन्दैन्द्र्याख्रिकैः ।

83-87a The dimensions of the finial having been given, its mouldings are now presented.[30] The height (of the finial) is to be divided into twenty-two parts, distributed as follows (starting from the base): one and a half for the lotiform base, a half for the (first) fillet above that, a half for the (first) reed, a half for the (second) fillet, one for the (first) doucine, five for the vase[31] next above that, one for the (second) doucine, half a one for the (third) fillet, one for the (first) supporting element, half a one for the (fourth) fillet, one for the (second) reed, half a one for the (fifth) fillet, one for the (second) supporting element, half a one for the (sixth) fillet, half a one for the (third) doucine, one for a slab,[32] half a one for the (fourth) doucine, half a one for the (third) reed and four and a half for the lotus bud.

30. The height of the finial has been given above vv.18-19. For the sake of clarity, the following table summarizes (starting from the top) the proportions given in vv. 83-89 (the total of the heights is wrong, being 21 in lieu of 22):

Name of the elements	Height	Width
mukula (lotus bud)	4 1/2	3
vetra (3rd reed)	1/2	2
ambuja (4th doucine)	1/2	5
phalaka (slab)	1	6
padma (3rd doucine)	1/2	5
kampa (6th fillet)	1/2	3
dhṛk (2nd supporting element)	1	2
kṣepaṇa (5th fillet)	1/2	3
vetra (2nd reed)	1	4
kṣepaṇa (4th fillet)	1/2	3
dhṛk (1st supporting element)	1	3
kṣepaṇa (3rd fillet)	1/2	3
paṅkaja (2nd doucine)	1	5
ghaṭa (vase)	5	9
paṅkaja (1st doucine)	1	5
kṣepaṇa (2nd fillet)	1/2	2
vetra (1st reed)	1/2	3
kṣepaṇa (1st fillet)	1/2	2
padma (lotiform base)	1 1/2	7

31. *Ghaṭa* (*kumbha, kalaśa*:) the 'vase', that is to say the finial bulbous part, is its most important element; its name is often applied to the finial itself (see e.g. 20.5. . .). See below vv. 193b sq.

32. *Phalaka* (or *pālī*, see 19.17): it is a kind of flat discus.

द्वित्रिवेदत्रिकद्व्यंशैर्गुणपञ्चर्तुपञ्चभिः ।
द्वित्रिभागैः क्रमाद् व्यासं मूलपद्मादिषु न्यसेत् ॥ ८८ ॥
मुकुलाग्रमंशमर्धार्धं यथाशोभवशान्नयेत् ।
चतुरष्टद्विरष्टाश्रं [152]साधारं वर्तुलं तु वा ॥ ८९ ॥
तदाकृतिः शिरश्छन्दमलङ्कारवशात् तु वा ।
तदाकृतिः [153]सुरोर्वीशविप्राणां च विशां मतम् ॥ ९० ॥
[154]सुरद्विजनृपाणां तु वैश्यानां नैव शूद्रके ।
तत्सम्बन्धं समापाद्य ध्वजदण्डं तदूर्ध्वगम् ॥ ९१ ॥
एवंलक्षणसम्पन्नं विमानं सम्पदां पदम् ।

[लेपः सुधाकर्म च]

करालमुद्गी[155] गुल्माषकल्कचिक्कणसाह्वयाः[156] ॥ ९२ ॥
चूर्णोपयुक्ताः पञ्चैते [157]सर्वकर्मसनातनाः ।
अभयाक्षबीजमात्रशर्कराः[158] स्युः करालकाः ॥ ९३ ॥
मुद्गबीजसमा क्षुद्रशर्करा मुद्गमिष्यते ।
सार्धत्रिपादद्विगुणकिञ्जल्कसिकतान्वितम् ॥ ९४ ॥
चूर्णस्य शर्कराशुक्त्योर्यद् [159]गुल्माषं तदुच्यते ।
करालं चापि [160]मुद्गीं च तेन मानेन योजयेत्[161] ॥ ९५ ॥

152. E : सालारं वकुलं
153. C : सराणाञ्च विप्राणां
154. E : omits 91a.
155. E : मुद्ग- for मुद्गी
156. F : साम्त्वया
157. E : सार्धकर्म-
158. A, B, C, F : शर्करास्वार्धचूर्णकाः; E : शर्कर-स्यार्धचूर्णकाः
159. A : गुल्मासं; B : कुल्माषं
160. E : मुद्गं
161. E : युज्यताम्

87b-89a The respective widths of these elements, starting from the lotiform base, are as follows: seven, two, three, two, five, nine, five, three, three, three, four, three, two, three, five, six, five, two, three (twenty-seconds of the total height). To enhance the appearance, (the dimensions of) the lotus bud may be increased by one or one half part.

89b-90 In the same way as for that which supports it,[33] this bud may be square, octagonal, sixteen-sided or circular or its form may be the same as that of the roof unless it accords with the decorative effect (required). These forms are suitable for gods, kings, brahmins and vaiśya.

91 Once this finial, suitable for gods, kings, brahmins and vaiśya, but not for śūdra, has been assembled, the mast for the flag is raised over it.

92a A temple built with these features is a guarantee of success.

Coatings and mortars[34]

92b-93a *Karāla*, *mudgi*, *gulmāṣa*, *kalka*, and *cikkaṇa*, mixed with lime are, all five, suitable for every kind of work.[35]

93b-94a *Karāla* is gravel stones the size of *abhaya* or *akṣa* fruits. *Mudgi* is gravel the size of a bean.

94b-95 What is called *gulmāṣa* is composed (of one part) of grains of sand (which are) one and a half, one and three quarters or twice the size of a lotus fibre, and (of one part) each of lime, gravel and shells.[36] *Karāla* and *mudgi* are also prepared in this way.

33. *Sādharam*: that is to say the finial itself, which supports the lotus bud.
34. Verses 92b-115 breaking off the logical sequence of the text, deal with mortars and coating. See above 16.49, *Īśānaśiva* (Kriyā. 33.52-78), *Vāstuvidyā* (8.5 sq.); cf. K.M. Varma, *The Indian Technique of Clay Modelling*, 1970, pp. 11 sq.; A.K. Coomaraswamy gives a recipe for preparation of coating which was in actual use in Srilanka at the beginning of the century and which is similar to that found here (*Mediaeval Sinhalese Art*, 2nd ed., New York 1956, pp.118-19)
35. Terms like *karāla* or *mudgī* designate types of coating or mortar as well as constitutive ingredients of them.
36. *Īśānaśiva* (Kriyā. 33.55) gives a similar recipe for *kalka*.

[162]पूर्वोक्तमात्रसिकताचणकश्चूर्णमानतः ।
क्रियार्थं पेषितं कल्कं [163]चिक्कणमस्तु केवलम् ॥ ९६ ॥
निश्छिद्रमिष्टमानेन गोत्रमिष्टकया दृढम् ।
पूर्वोक्तानां च पञ्चानां विधांतव्यं पृथक् पृथक् ॥ ९७ ॥
तत्र तत्र तदुक्तेन द्रव्येण परिकल्पयेत् ।
केवलेनाम्भसा पूर्वं पूर्वांस्त्रिस्त्रिः प्रकुट्टयेत्[164] ॥ ९८ ॥
क्षीरद्रुमकदम्बाम्राभयाक्षत्वग्जलैः पुनः ।
त्रिफलोदैस्ततस्तद्वन्माषयूषैस्ततस्तथा ॥ ९९ ॥
संयम्य शर्कराशुक्तिं[165] चूर्णं तत्खातवारिणि[166] ।
[167]खुरसङ्कुट्टनं कृत्वा स्रावयित्वाऽथ वाससा ॥ १०० ॥
कल्कं च चिक्कणं तेन कल्कनीयं विचक्षणैः[168] ।
दधिदुग्धमाषयूषगुडाज्यकदलीफलैः ॥ १०१ ॥
जलैश्च नालिकेरस्य चूतपक्वरसैः सह[169] ।
[170]कल्पितं शिल्पिभिर्यत् तद् बन्धोदकमिति स्मृतम् ॥ १०२ ॥
शुद्धिं शुद्धोदकेनादौ कृत्वा बन्धाम्भसा ततः[171] ।
आलिप्य सुधया कार्या नानारूपान्वितक्रिया[172] ॥ १०३ ॥
दग्धैश्च [173]मृण्मयैश्चापि [174]लोहलोष्टैर्यथोचितम् ।
गोपानस्योपरिष्टात् तु च्छादनीयं विचक्षणैः[175] ॥ १०४ ॥
करालच[176] मुद्गिगुल्माषघनमेकैकमङ्गुलम् ।
कल्कमानं तदर्धेन तदर्धार्धं तु चिक्कणम् ॥ १०५ ॥

162. F : पूर्वोक्तमाग्रसिकता चूर्णकचूर्णमानम्
163. A, B, C, E : चिक्कणं मस्तु; F : चिक्कणं मास्तु
164. E : परिकल्पयेत्; F : प्रकट्टयेत्
165. F : शुक्त्या for शुक्तिं
166. B : खातवारिणा
167. E : पुर-
168. F : कल्पनीयं स्वशिल्पिभिः
169. C : तथा
170. E : कल्पितं शिल्पिभिः कुर्यात् तत् बन्धकमिति स्मृतम्
171. A, C : न तु; F : पुनः
172. F : नानारूपान्वितं त्रिधा
173. F : क्रममयैश्च
174. B : लोहलोष्टैर्ययोचितम्
175. E : चदयेत्तु विचक्षणः
176. E : मुद्ग-

96 To make *kalka,* grains of sand of the dimensions indicated above and (morsels) of lime the size of a chickpea should be crushed together. *Cikkaṇa* must be an homogeneous (liquid).[37]

97-98a These five products are used separately to join bricks securely together without gaps and as prescribed; the proper one should be chosen for each usage.

98b-101a First, each of the above (substances) is crushed with pure water then (they are ground) anew with sap from *kṣīradruma*, *kadamba*, mango, *abhaya* and *akṣa* as well as with juice of the fruits of the three myrobolans and water of broad bean; next, after the gravel, shells and lime have been mixed with well water, the mixture should be pounded by horses' hooves, then filtered through fine linen; this is how well advised people impart viscosity to *kalka* and *cikkaṇa.*[38]

101b-103 That called *bandhodaka* is prepared by the masons, using curds, milk, bean water, molasses, clarified butter, bananas, coconut milk and mango juice. After the wall has been washed with clear water the *bandhodaka* is used as a coating if images of any sort are to be placed there.

104-105 Above the cornice and according to prescription, well advised people place tiles, baked or unbaked or in metal, and cover them (with coating); the *karāla* layer is one digit thick as are those of *mudgi* and *gulmāṣa; kalka* is half as thick and the thickness of *cikkaṇa* is half that (of *kalka*).

37. According to *Īśānaśiva* (Kriyā. 33.56a) there are two kinds of *cikkaṇa* respectively called *kevalāmbhas* and *baddhodaka*; these two terms are found here: *kevalāmbhas* ('pure water') is an ingredient for making *cikkaṇa,* while *bandhodaka* ('binding water') is a mixture applied on a wall before it being covered with coating (infra vv. 101b-103).

38. cf. *Īśānaśiva* Kriyā. 33.56b-59a:

केवलेवाम्भसा पूर्वं पूर्वोक्तांस्त्रिः प्रकुट्टयेत् ॥
क्षीरद्रुमाम्रलाक्षाणां कदम्बाभययोरपि ।
स्रग्जेलैस्त्रिफलातोयं माषयुषं च तत्समम् ॥
संयम्य शर्कराशुक्त्योश्चूर्णं तत्खातवारिणि ।
खुरसंकुट्टनं कृत्वा स्रावयित्वाथ वाससा ॥
चिक्कणं कल्पयेत् तेन ··· ।

जलस्थलप्रयुक्ते तु यथेष्टं घनमिष्यते ।
षण्मासमुत्तमं प्रोक्तं चतुर्मासं तु मध्यमम् ॥ १०६ ॥
अधमं तु द्विमासं स्यादेषामुषित[177]मिष्यते ।
ततो बन्धोदकैरेतान् संक्लेद्य क्रमशः कृतिः[178] ॥ १०७ ॥
लुपोपरीष्टकास्तारे [179]चैवं चूर्णक्रियां पुनः ।
आच्छादनीयं यत्नेन [180]तद्घनं छादनं विदुः ॥ १०८ ॥

[चित्रकर्म]

देवानां च [181]द्विजानां चावासे योग्यं सनातनम् ।
बहिरन्तश्च सर्वेषां [182]चित्रं युञ्जीत बुद्धिमान्[183] ॥ १०९ ॥
सुमङ्गलकथोपेतं [184]श्रद्धानृत्तक्रियान्वितम् ।
विप्रादीनां च वर्णानां निवासं सम्पदां पदम् ॥ ११० ॥
संग्रामं मरणं दुःखं देवासुरकथान्वितम् ।
नग्नं तपस्विलीलां चामयाव्यादि [185]न योजयेत् ॥ १११ ॥
अन्येषामन्यथा [186]वासे साधनीयं यथेष्टतः[187] ।
पञ्चांशं माषयूषं स्यान्नवाष्टांशं गुडं दधि ॥ ११२ ॥
आज्यं द्व्यंशं तु सप्तांशं [188]क्षीरं चर्म षडंशकम् । ।
त्रैफलं दशभागं स्यान्नालिकेरं युगांशकम्[189] ॥ ११३ ॥
[190]क्षौद्रमेकांशकं त्र्यंशं कदलीफलमिष्यते ।
लब्धे चूर्णे दशांशे तु [191]युञ्जीतव्यं सुबन्धनम् ॥ ११४ ॥

177. E : ऊषकम् for उषितम्; F : उष्टितम्
178. C : क्रमशः कृती; E : कमलकृतिः
179. F : नैव
180. B : तद्धनं
181. C : द्विजानां च सैव योग्या; F : द्विजादीनां वासयोग्यं
182. A, B, C, E : छत्रं
183. E : सद्यनाम्
184. F : गन्धानृत्त- for श्रद्धानृत्त-
185. F : नियोजयेत्
186. E : सर्वे for वासे
187. F : यथोदितः
188. E : क्षीरकं तत्
189. E : युतांशकम्
190. E : क्षौद्रमेकादशांशं स्यात्
191. C : युञ्जीतैवं

106 However, In the case of a gutter,[39] the thickness is chosen according (to the specific circumstance).

107 It takes six months to obtain a perfect result, four for an average one and two for a mediocre one;[40] then, the materials having been moistened with *bandbodaka,* the procedure is as has been given above.

108 A bed of bricks is then arranged above the rafters and lime (?) is put on it. It is known that the (brick) roofing must be completely covered with coating to the thickness indicated above.

Paintings

109 On the (walls) of the houses of gods and brahmins, inside as outside, the well advised man will always put paintings which are suitable for them.

110-112a Representations of joyous scenes and religious images are proper for the houses of brahmins, and of other castes too, where they bring success. Battle scenes and images of death and misfortune should not appear there nor representations of combat between gods and demons, neither pictures of naked mendicants, of the love play of ascetics[41] nor of suffering people. In the houses of others one may do otherwise if one so wishes

112b-114 There[42] must be five parts of bean water, nine of molasses, eight of curds, nine of clarified butter, seven of sap, six of leather (?), ten of juice of the three myrobolans, four of coconut milk, one of honey and three of bananas. To obtain a good mortar, all these elements should be mixed with a hundred parts of lime. It is said that there should be more of molasses, honey and milk than of any other ingredients (?).

39. *Jalasthala*: see e.g. 22.27b.
40. This seems to imply that, once prepared, the coating mixtures have to be kept for fermentation (cf. Coomaraswamy, *op.cit.*, p.118).
41. Cf. J. Gonda, "Ascetics and Courtesans", *Adyar Library Bulletin,* vol. 25 (1961), pp. 78-102 (esp. p. 98).
42. This recipe concerns the preparation of a mortar (cf. below *subandhana*).

[192]सर्वेषामधिकं शस्तं गुडं च दधि दुग्धकम् ।
चूर्णद्व्यंशं करालं मधुघृतकदलीनालिकेरं च माषं
[193]शुक्तेस्तोयं [194]च दुग्धं दधिगुडसहितं[195] त्रैफलं तत् क्रमेण ।
लब्धे [196]चूर्णे [197]शतांशेऽशकमिदमधुना चानुवृद्धिं प्रकुर्या-
देतद् बन्धं दृषत्सादृशमिति कथितं तत्त्वविद्भिर्मुनीन्द्रैः ॥ ११५ ॥

[मूर्ध्नेष्टका]

देवानां द्विजभूमीशवैश्यानां भवनेऽधुना ॥ ११६ ॥
मूर्ध्नेष्टका विधातव्याश्चतस्रो लक्षणान्विताः ।
सुस्निग्धाः समदग्धाश्च सुस्वनास्ताः सुशोभनाः ॥ ११७ ॥
स्त्रीलिङ्गाश्चापि पुल्लिङ्गा[198] भिन्नच्छिद्रादिवर्जिताः ।
विस्तारायामतीव्रैस्तु प्रथमेष्टकया समाः[199] ॥ ११८ ॥
शिलामये शिला प्रोक्ता सर्वदोषविवर्जिता ।
[200]जन्माद्याशिखरान्तं च यैर्द्रव्यैश्च [201]विनिर्मितम् ॥ ११९ ॥
तैरेवादौ तथान्ते च न्यस्तव्याश्चेष्टकाः शुभाः ।
मिश्रद्रव्यैश्च सङ्कीर्णे यैर्द्रव्यैरुपरि [202]स्थितम् ॥ १२० ॥
तैरेव मूर्ध्नि विन्यासं रहस्यमिदमीरितम् ।

[स्थूपिकाकीलम्]

लोहजं दारुजं वाऽपि स्थूपिकाकीलमिष्यते ॥ १२१ ॥

192. C : सर्वेषामधिकांशं तु गुडं
193. A, C, F : चक्रे; E : कृते
194. A, C : चापि
195. F : सलिलं instead of सहितं
196. E : पूर्णो
197. F : तथांशे
198. E : भिन्नच्छिन्नादिवर्जिताः
199. C : समा
200. F : जन्मार्थं शिखरार्थं
201. F : विनिश्चितम्
202. E : स्मृतम्

115 To a hundred parts of lime are added two parts of a mixture made of two parts each of lime, *karāla*, honey, clarified butter, bananas, coconut (milk), bean (water), tamarind (water) (?) milk, curds, molasses and juice of the three myrobolans; in this way a mortar is obtained which sages, versed in the Tantra, say is rock-like.

The crowning bricks[43]

116-118 Next, four crowning bricks are placed at the top of the dwellings of gods, brahmins, kings and vaiśya;[44] these are their characteristics: they are perfect and evenly baked, they give a pleasant sound and are of pleasing appearance, they are male or female and have neither fissures nor holes, their width, length and thickness are the same as those of the first bricks.

119-120a In a stone building the 'bricks' are to be flawless stones; the bricks used at the start and finish of construction[45] must be auspicious and must be of the same nature as the materials used from base to roof.

120b-121a (The bricks) at the top of a 'mingled' building[46] made up of mixed materials should however be of the same nature as the materials of the upper parts; here is revealed a secret.

43. The half-verse 116 is the second part of half-verse 92a. We go back here to the description of the top of the temple: a sacred deposit is to be placed there, which is similar to the foundation deposit arranged at the bottom of the construction (see chapter 12). Such completion deposits are well-known in Southeast Asia; in Cambodia they are generally placed on a square and flat slab (cf. J. Boisselier, *Le Cambodge*, 1966, pp. 209-11 or G. Coedès in *Bulletin de l'Ecole Franc, aise d'Extrême-Orient*, t. 40, 1940, pp. 332-33). See *Ajita* (chapter 15), *Śilparatna* (chapter 24), *Kāraṇāgama* (I. chapter 10), *Suprabbedāgama* (Kriyā. chapter 32), etc.

44. 'Crowning bricks' (*mūrdbneṣṭakā*) are similar to 'first bricks' (cf. 12.101 sq.). They are generally four in number (*Ajita, Kāraṇāgama, Śilparatna*); however *Suprabbedāgama* (Kriyā. 32.2) and *Kāśyapajñānakāṇḍa* (chapter 32) prescribe to place five of them. T. Goudriaan, translator of *Kāśyapajñānakāṇḍa*, has shown that that last number is connected with the *pañcabbūta* (Goudriaan 1965 p. 113 n. 3 and p. 175. note 10), which is confirmed by *Suprabbedāgama* (Kriyā. 32.13a):

पार्थिवादीनि तत्त्वानि पञ्चेष्टकाधिदेवताः ।

45. That is to say first and crowning bricks.

46. *Saṅkīrṇe*: see above 15.80

ऊर्ध्वभूम्यङ्घ्रिणायामविस्तारं [203]पादतः समम्।
अग्रमङ्गुलविस्तारमानुपूर्व्या कृशं तथा[204] ॥ १२२ ॥
चतुरश्रसमं कुर्यात् त्रिभागैकमधस्तथा ।
वृत्तमूर्ध्वमधः कुर्याच्छिखिपादं न्यसेदधः[205] ॥ १२३ ॥
विस्तारत्रिगुणायामं व्यासोच्चं पादतः समम् ।
अश्रमं तु यथा भूमौ पञ्चमूर्तिसमन्वितम् ॥ १२४ ॥
अथवा तच्छिखायामद्विगुणं कीलदैर्घिकम् ।
स्तम्भव्यासार्ध[206]विस्तारत्रिचतुर्भागमेव वा ॥ १२५ ॥
अग्रमर्धाङ्गुलव्यासं शिखिपादं यथाबलम् ।
शिखराकृतिवत् कीलं लिङ्गच्छन्दमथापि वा ॥ १२६ ॥
एवं त्रिधा समुद्दिष्टं स्थूपिकाकीलमार्यकैः[207] ।

[मूर्धेष्टकादिस्थापनम्]

सद्मनश्चोत्तरे पार्श्वे मण्डपे तु सुसंस्कृते ॥ १२७ ॥
चतुष्प्रदीपसयुंक्ते वस्त्रैश्च परिवेष्टिते ।
सर्वमङ्गलसंयुक्ते शुद्धशाल्यास्तरे शुभे ॥ १२८ ॥
स्थण्डिले चण्डितं कृत्वा मण्डूकं वाथ तत्परम्।
विन्यस्य [208]देवान् ब्रह्मादीन् श्वेततण्डुलधारया ॥ १२९ ॥

203. E : पादतत् instead of पादतः न्यसेत्ततः
204. F : ततः
205. E : न्यसेत्ततः
206. E : व्यासात्तत् for व्यासार्ध-
207. E : आचरेत् for आर्यकैः
208. F : देवादीन्

Axis of the finial[47]

121b-122 A wood or metal axis is prescribed for the finial. Its width at the bottom and its height are equal to those of a pillar of the upper storey and it tapers progressively towards the top which is one digit wide.

123-124 The lowest third (of the axis) is square section and above that it is circular; at the bottom is disposed the 'peacock's foot'[48] the length of which is three times its width and whose width and height are equal to the diameter of a pillar; it is solid as if on the ground (?) and decorated with five images (?).[49]

125-126a Otherwise, the length of the axis is double that of the finial and its width half, one-third a quarter the diameter of a pillar; in that case the diameter at the top is half a digit and the peacock's foot is calculated in terms of the degree of stability required.

126b-127a The axis of the finial may be in the shape of a pin, nail, or Liṅga;[50] these are the three shapes the sages prescribe.

Consecration ceremony[51]

Laying in place of the crowning bricks

127b-129 A pavilion[52] is to be constructed next to the building and to the north; the sacrificial area, where there are four lamps, is covered with cloth and endowed with all the auspicious subjects; a *caṇḍita* (diagram), also called *maṇḍūka*,[53] should be drawn on a propitious layer of pure unhusked rice; then the gods should be arranged starting with Brahmā, with an offering of husked white rice.

47. *Sthūpikākīlā*: cf. above vv. 66b sq., *Śilparatna* (34.4b sq.), *Ajita* (15.6 sq.), *Suprabheda* (Kriyā. 32.7-9a). . This axis which goes through the finial, is set upon the crowning bricks (see v. 146).
48. *Śikhipāda*: this element which must be the support of the axis, is also mentioned in parallel texts. One may note that in *Arthaśāstra* (II.19.25), the wooden weighing balance is said to be supported by a 'peacock's foot' (kāṣṭhatulā. . . mayūrapādādhiṣṭhitā).
49. Half-verse 124b is probably out of place.
50. *Liṅgacchanda*: according to *Śilparatna* (34.8b-9a) the axis of the finial may be square at the base, octagonal at the centre and circular at the top, that is to say similar to a Liṅga.
51. The consecration ceremony marks the completion of the temple; thus its description is placed here, once all the architectural elements are described.
52. That pavilion is described in several āgamic text: e.g. *Ajita* (15.14 sq.), *Kāraṇāgama* (I.10.11b sq.), *Suprabhedāgama* (Kriyā. 32.1 sq.).
53. Cf. above 7.43 sq.

आराध्य गन्धपुष्पाद्यैर्भुवनाधिपतिं जपेत्[209] ।
देवताभ्यो बलिं दत्त्वा तत्तन्नाम्ना यथाविधि ॥ १३० ॥
स्थपतिः कलशान् न्यस्य पञ्च पञ्च सलक्षणान् ।
सुगन्धोदकसम्पूर्णान् पञ्चरत्नसमायुतान् ॥ १३१ ॥
[210]ससूत्रान् [211]वस्त्रकूर्चालान् सापिधानान् सहेमकान् ।
उपपीठांशदेवानां स्वस्वनाम्नाभिधाय च ॥ १३२ ॥
प्रणवादिनमोन्तेन गन्धाद्यैरर्चयेत् क्रमात् ।
[212]प्रक्षाल्य पञ्चगव्यैस्तु नवरत्नकुशोदकैः ॥ १३३ ॥
इष्टकाश्च [213]यथाकीलं सूत्रैरावेष्टयेत् क्रमात् ।
कुम्भस्य दक्षिणे शुद्धशालीस्थण्डिलमण्डले ॥ १३४ ॥
आराध्य गन्धपुष्पैश्च बलिं दत्त्वा यथाविधि ।
इष्टकाश्चैव कीलांश्च वेष्टयेदम्बरैः शुभैः ॥ १३५ ॥
[214]श्वेतवस्त्रास्तरस्योर्ध्वे न्यसेद् दर्भास्तरे शुचिः ।
स्थपतिर्वरवेषाढ्यः शुक्लमाल्यानुलेपनः[215] ॥ १३६ ॥
[216]सितवस्त्रपरिच्छिन्नोत्तरीयो हैममुद्रिकः[217] ।
पीत्वा शुद्धं पयो रात्रावुपोष्याधिवसेत् सुधीः ॥ १३७ ॥
कलशस्योत्तरे पार्श्वे सितवस्त्रपरिस्तरे[218] ।
[219]ततः प्रभाते विमले नक्षत्रकरणान्विते ॥ १३८ ॥
[220]सुमुहूर्ते सुलग्ने च स्थपतिः [221]स्थापकेन तु ।
पुष्पकुण्डल[222]हारादिकटकैरङ्गुलीयकैः ॥ १३९ ॥

209. F : जपन्
210. F : omits 132-133.
211. A : वस्त्रकूर्चाला
212. E : omits 133b-134a.
213. F : तथा
214. E : श्वेतवस्त्रोत्तरासुराद्यैर्
215. E : -लेपनैः
216. F : सितवस्त्रपरिच्छित्रकर्तरिकुटिकैरपि ।
217. E : हेममुद्रिकाः
218. F : परिच्छदे
219. E : तत्र
220. F : मुहूर्ते च
221. E : स्थापकाज्ञया
222. F : हाराभिः

130-132a After propitiating the Lord of the World with perfumes and flowers, the architects, in a murmur, invoke Him. An offering is then made to the gods (by calling them) each by name and according to the ritual. Next, twenty-five identical pitchers are set out, filled with perfumed water and surrounded by the five jewels as well as by braids, herbs and gold pieces; these pitchers are provided with covers.

132b-133a Then, when each of the gods of the *upapīṭha* diagram has been called by name in a (formula) beginning with OṂ and ending with *namas,* they are propitiated with flowers, perfumes etc.[54]

133b-134a When bricks and axis have been washed with the five products of the cow as well as with water of *kuśa*[55] and of the nine gems, they are covered with a cloth.

134b-136a To the right of each vase, upon the sacrificial area of pure unhusked rice, an offering is made to the gods according to the ritual after they have been appeased with flowers and perfumes;[56] the bricks and the axis are then wrapped in cloth and arranged on a spread of *darbha.*

136b-137a This must be done by the pure minded architect who must be clad in fine clothes and garlanded with white flowers; his upper clothing is covered by a white cloth and he holds a piece of gold in his hand.

137b-138a After drinking pure water and undergoing a fast, with his mind at peace, he settles down for the night on a white cloth to the north of the vases.

138b-141a (In the morning), the sun being without spots, during an auspicious lunar month and fortnight, under a favourable conjunction, the architect must follow the directions of the *sthāpaka*; the five[57] parts of his body

54. Cf. above 7.28.

55. Cf. *Ajita* 22.12:

उशीरचन्दनोपेतं कुशाग्रैश्च समन्वितम् ।
कुशाम्ब इति निर्दिष्टं प्रणवेनाभिमन्त्रितम् ॥

56. These offerings have been described in chapter 8.

57. Verses 139b-142=12.38-41a.

पञ्चाङ्गभूषणैर्हेमनिर्मितैस्तु विभूषितः ।
हेमयज्ञोपवीतस्तु [223]नववस्त्रपरिच्छदः ॥ १४० ॥
श्वेतानुलेपनश्चैव सितपुष्पशिराः शुचिः ।
ध्यात्वा धरातलं सर्वं [224]दिग्द्विपेन्द्रसमायुतम्[225] ॥ १४१ ॥
ससागरं सशैलेन्द्रमनन्तस्योपरि स्थितम् ।
सृष्टिस्थितिलयाधारं भुवनाधिपतिं जपेत् ॥ १४२ ॥
[226]स्नापयित्वेष्टकाकीलं पूर्वोक्तैः कलशोदकैः ।
आराध्य गन्धपुष्पैश्च धूपदीपसमन्वितैः ॥ १४३ ॥
बलिं दत्त्वा यथान्यायं जयशब्दादिमङ्गलैः ।
विप्रस्वाध्यायघोषैश्च शङ्खभेर्यादिनिःस्वनैः ॥ १४४ ॥
स्थापयेदिष्टकाः सम्यक् पूर्वदक्षिणतः क्रमात् ।
[227]शिखरार्धे विमानस्य गग्रपत्रान्तरेऽपि वा ॥ १४५ ॥
शिखरत्रिचतुर्भागावसाने वाम्बुजादधः ।
[228]तदाद्यात् [229]स्थूपिकायामात् कीलदैर्घ्यं प्रगृह्यताम् ॥ १४६ ॥
पूर्वमेवेष्टकास्थानं निश्छिद्रं तु दृढीकृतम् ।
तन्मध्ये नवरत्नानि विन्यसेच्च यथाक्रमम् ॥ १४७ ॥
ऐन्द्रे मरकतं विद्याद् वैडूर्यं वह्निगोचरे ।
इन्द्रनीलं तु याम्यायां मौक्तिकं पितरि स्मृतम् ॥ १४८ ॥
वारुणे स्फाटिकं विद्यान्महानीलं समीरणे ।
[230]वज्रं तु सौम्यदेशे स्यादैशान्यां तु प्रवालकम् ॥ १४९ ॥
[231]माणिक्यं मध्यमे भागे हाटकं च विनिक्षिपेत् ।
रसोपरसबीजैश्च धान्यान्यप्यौषधानि च ॥ १५० ॥

223. F : नववस्त्रोत्तरीयकः
224. E : दीर्घवैन्द्र-; F : दिश्चोपेन्द्र-
225. C : समन्वितम्
226. C : स्थापयित्वेष्टकाकीलं; E : स्थापययेष्टककीलं;
F : स्नपयेदिष्टककीलं
227. E : शिखरार्धे विमाना स्युरग्रपत्रान्तकैरपि;
F : शिखरार्धेऽपि वा नासिकाग्रे पत्रान्तकेऽपि च ।
228. F : तदाद्यात् स्थूपिकाकीलात् कौलदीर्घं प्रशस्यते ।
229. C : स्तूपिका- (everywhere).
230. F : वज्रमिन्दुनिक्षिप्तं
231. F : मध्यमे पद्मरागं तु हाटकं तत्र विन्यसेत् ।

are adorned with flowers, ear-rings, necklaces, bracelets and rings; he must be covered with gold jewellery, wear a gold sacrificial thread, be clad in new clothes, anointed with white paste and he must be crowned with white flowers; his mind must be pure.

141b-142 He must first meditate upon the Earth's surface in its totality. She who supports the Lords of the cardinal points and of the continents and who, along with the Ocean and the Lords of the mountains, rests upon Ananta; then, in a whisper, he invokes the Lord of the World who is responsible for Creation, Existence and Death.

143 It is now that the bricks and the axis are washed with water from the vases, as described above, and the architect propitiates the gods with flowers, perfumes and incense and with the lighting of the lamps.

144-145a After making an offering according to the ritual,with auspicious cries such as 'Jaya', and after the brahmins have murmured the Veda and, once conches and drums have sounded, the architect lays the bricks in place starting from the south-east.

145b-146 He arranges them half way up the height of the roof of the building or between the *gagra* and the *patra* (?)[58] or at a third or a quarter the height of the roof or under the lotus (surmounting the roof), it is there that the axis of the finial is elevated, its length depending upon the height of that finial.

147a The position of the bricks has been consolidated beforehand and any holes found there have been filled in.[59]

147b-150 The nine precious stones are placed in the middle (of the four bricks): emerald to the east, tiger's eye to the south-east, *indranīla* sapphire to the south, pearl to the south-west, crystal to the west, *mahānīla* sapphire to the north-west, diamond to the north and coral to the north-east. In the very centre are a ruby and gold along with simples, (the grains figured) in metal, (colouring) substances, *bīja* and grains.[60]

58. *Gagra, patra*: these two elements have been mentioned above (vv. 72-73) in relation with the internal arrangement of the top of the roof; we do not know what is their role.

59. In order to make it watertight (cf. chapter 12 note 3).

60. Components listed here are the same than those prescribed for the foundation deposit: *ratna* (cf.12.27b sq.), *auṣadha* (12.30), *rasa* (grains figured in metal, 12.23), *uparasa* (colouring substances 12.25), *dhānya* (12.8); the *bīja* may be ingredients specific to each god (12.32 sq.). Earths and roots (12.5 sq.) do not appear here as they are specifically connected with foundation.

तदूर्ध्वे स्थूपिकाकीलं स्थापयेदचलं समम् ।
तस्मात् प्रकृतिभूम्यन्तमुदग्दिशि [232]महाध्वजम् ॥ १५१ ॥
ग्रथितं क्षौमवस्त्रैश्च कार्पासैर्वा मनोहरैः ।
लम्बयेत् तदुदक्प्राच्यौ प्रागुदग्विदिशं ततः ॥ १५२ ॥
संस्पृशेद् यदि सर्वेषां प्राणिनां [233]सम्पदृद्धये ।
भवनं स्थूपिकीलं च पट्टैरावेष्ट्य [234]शुभ्रकैः ॥ १५३ ॥
चतुर्दिक्षु चतुर्गाश्च सवत्साः [235]सन्निवेशयेत् ।
द्वारालङ्करणं कुर्यात् [236]सुविचित्राम्बरैर्नवैः ॥ १५४ ॥

[दक्षिणादानम्]

यजमानो विशुद्धात्मा प्रणम्य शिरसा गुरुम् ।
विमानस्थूपिकास्तम्भद्वारालङ्करणानि च ॥ १५५ ॥
वस्त्राणि धनधान्यैश्च पशूनपि सवत्सकान् ।
मुदा स्थपतये दत्त्वा शेषान् [237]भक्त्या तु तर्पयेत् ॥ १५६ ॥

[रत्नादिस्थानम्]

एवं मुनिवरैः प्रोक्तं प्रासादानां तु मूर्धनि ।
हर्म्याणां गर्भसंयुक्तौ नेत्रभित्तौ तलान्तरे[238] ॥ १५७ ॥
मण्डपे मध्यदेशे तु सभादीनामधोऽम्बुजात्[239] ।
प्रासादवद् विधातव्यं गोपुराणां तु मूर्धनि ॥ १५८ ॥

[कर्मसमाप्तिः]

एवं तु विधिना सम्यक् सम्पन्नं सम्पदां पदम् ।
येन यत् कर्म चारब्धमादौ तदवसानके ॥ १५९ ॥

232. F : महाद्ध्वम्
233. F : सम्प्रवर्धयेत्
234. F : शुद्धकैः
235. F : सुनिवेशयेत्
236. E : स्वचित्रा-
237. F : भक्त्या संतर्पयेत्
238. C, E : तलान्तके
239. A (var) : (अ-)म्बुजाम्; C, F : (अ-)म्बुजम्

151-153a The axis of the finial is placed above this in such a way as to be stable and straight. From that axis is suspended a long banner going down to the ground floor; it should be attached with beautiful braids of linen or cotton and should hang towards the north-east; if it touches the ground at the north-east this increases the good fortune of all living beings.

153b-154 Next, the building and the axis of the finial are to be covered with strips of white cloth;[61] then a cow and her calf are installed at each of the four cardinal points and the door is decorated with cloth of various colours.

Honoraria for officiating priests

155-156 The donor of the sacrifice, whose mind is pure, bows his head before the master,[62] then, with a joyous heart he gives to the architect the cloth that has been adorning the doors, pillars, finial and temple and he gives, as well, grains, money and cows, with their calves, and he honours other assisting people with his devotion.

The placing of the deposit

157-158 This is the way in which to proceed, according to the best of sages: in temples, (the deposit should be placed) at their summit, in palaces, on the lateral walls (at the bottom of which is the foundation deposit) and between the storeys; in pavilions it is in the centre, in halls and similar buildings it is placed under the lotus (which surmounts the roof) and in gateways it is at the summit, as in temples.

The completion of the work

159-161 That which is done according to the ritual is a source of success. He who constructs a building, from beginning to end, gains an overflow of happiness, pleasure and well-being but, if he should die (before the work is finished) his son or his pupil must draw on a piece of cloth (the image) of his master and bring the undertaking to a successful

61. These strips are the 'dresses' of the temple (see below v.181).
62. *Guru*: that is to say the *sthāpaka* who acts as the officiating priest in the rituals connected with architecture (see below v. 165).

तेनैव निष्ठितं कर्म [240]श्रीसौभाग्यायुरेधनम् ।
तस्याभावे तु तत्पुत्रः शिष्यो वा तं गुरुं पटे ॥ १६० ॥
लिखित्वा तन्नियोगेन सर्वकर्म समाचरेत् ।
अज्ञानात् त्वरितेनापि यद्वस्त्वन्येन भावितम् ॥ १६१ ॥
[241]करोति स्वामिनं शीघ्रमन्यथेति[242] ह निश्चयः ॥
प्रथमं कृतवान् विधिं यथावत्
कृतवानेव करोति निष्ठितान्तम् ।
अथ वा विधिरन्यथा भवेच्चे-
दशुभं स्वामिनमन्यथा करोति ॥ १६२ ॥
एवं ग्रीवालङ्कृतं [243]पुष्कराभं
मानं मल्लानां शिखाभूषणं च ।
युक्त्या सर्वेषां करालादिबन्धं
प्रोक्तं सम्यक् [244]चेष्टकाबन्धमूर्ध्वे ॥ १६३ ॥

[स्थूपिकीलवृक्षाः]

खदिरसरलसालस्तम्बकाशोकवृक्षाः
पनस[245]तिमिसनिम्बाः सप्तपर्णाश्च सर्वे ।
[246]परुषवकुलवह्निक्षीरिणीत्येवमाद्याः
सुदृढविमलसाराः स्थूपिकीलाः प्रसिद्धाः[247] ॥ १६४ ॥

240. A (var): श्रीसौभाग्यायुषे धनम् ; E: श्रीसौभाग्यायुविवर्धनात्
241. E: करं तु; F: करोतु
242. C: अन्यथेतोह
243. E: प्रल्कराभं
244. F: चेष्टकाश्रमुदे
245. B: तिमिष-
246. E: वरुष-; F: परिष-
247. F: प्रशस्ताः

conclusion according to the rules expounded by his master;[63] the building which, due to ignorance or haste, is completed according to other rules, will bring about the rapid and certain death of its owner.

162 If someone embarks upon something in a particular way, he must finish it in the same way; otherwise, if he alters that way, this will bring about unfortunate changes in (the life of) the house owner.

163 The characteristics of the attic have been given, the shapes of *puṣkara*, the dimensions of *malla* and the ornamentation of the summit (of the building); (also indicated) has been the correct method of binding all the elements with a mortar such as *karāla*, as well as that of placing the crowning bricks.

Wood for the axis of the finial[64]

164 *Khadira*, *sarala*, *sāla*, *stambaka*, *aśoka*, *panasa*, *timisa*, *nimba*, *saptaparṇa*: all these trees as well as *puruṣa*, *vakula*, *vahni*, *kṣīriṇī* and other similar trees are suitable for making the axes of finials strong, without flaws, solid and perfect

63. From this passage and from what has been said before (5.19) it appears that it is the *sūtrāgrāhin* who must complete the work.

64. See above vv.121 sq.

[सम्प्रोक्षणकर्म]

[248]अथ हर्म्ये परिनिष्ठिते [249]तदा
यजमानोऽपि गुरुश्च वर्धकिः[250] ।
उदगायनशोभनर्क्षपक्षे[251]
जलसम्प्रोक्षणकर्म चारभेत् ॥ १६५ ॥

[अधिवासमण्डपः]

नवसप्तत्रिकपञ्चरात्रिके विधिना [252]चाङ्कुरार्पणं कुरु ।
भवनस्योत्तरपूर्वदेशतः[253] [254]स्वधिवासार्हमण्डपं चरेत् ॥ १६६ ॥
[255]नवसप्तेषुकरैर्युगाश्रकं वसुपादं नववस्त्रशोभितम् ।
सवितानं [256]सुपटैर्निवेष्टितं सुमनोज्ञं सितपुष्पशोभितम् ॥ १६७ ॥
तस्य मध्ये तु [257]शालीभिः स्थण्डिलं दण्डमानतः ॥ १६८ ॥
कृत्वाष्टाष्टपदं [258]न्यस्य ब्रह्मादीन् वस्तुनायकान् ।
श्वेततण्डुलधाराभिर्विन्यस्याराध्य पुष्पकैः ॥ १६९ ॥
[259]गन्धैर्धूपैश्च दीपैश्च बलिं दत्त्वा विधानतः ।
तदूर्ध्वं पञ्चपञ्चैव कलशान् [260]वस्त्रशोभितान् ॥ १७० ॥
मणिहेमसमायुक्तान् ससूत्रान् सापिधानकान् ।
निष्कलङ्कानसुषिरान् हाटकोदकपूरितान् ॥ १७१ ॥
उपपीठ[261]पदस्थांस्तान् स्वस्वनाम्नाभिधाय च ।
ओङ्कारादिनमोन्तेन चार्चयित्वा न्यसेत् ततः ॥ १७२ ॥

248. E : अथ हर्म्योपरिनिष्ठिते
249. F : यदा
250. F : बन्धकी
251. A (var) : नक्षत्रपक्षे
252. E : वा-
253. F : देशके
254. E : स्वधिवासमभिमण्डपं; F : अधिवासाया तु मण्डपं
255. F : नवसप्ततिसुरैर्
256. F : शुलभैश्च निर्वेष्टितं
257. F : शिलाभिः
258. F : लिख्यं
259. F : गन्धैर्द्रव्यैः धूपैश्च
260. F : वस्त्रसुशोभितान्
261. E : पदस्थानं

Consecration rites[65]

165 Once the building is finished, the donor, as well as the master and the *vardhaki*[66] must perform the rite of consecration by water and they must do so during the (auspicious) fortnight of a favourable lunar month, in the period when the sun's path is to the north.

The pavilion for the preparatory rites[67]

166-167 For nine, six, three or five nights, the *aṅkurārpaṇa*[68] is celebrated according to the ritual: a beautiful consecration pavilion is built to the north or the east of the building; it is to be square, nine, seven or five cubits wide and provided with eight pillars; it is decorated with new cloth and (inside) is a canopy covered with fine fabrics, decorated with white flowers and of pleasing appearance.

168-170a In the middle of the pavilion a sacrificial area is laid out with unhusked rice; it is one pole wide. A diagram is drawn there with sixty-four squares, where the guardians of the site are arranged, starting with Brahmā; they are represented by husked white rice and propitiated with flowers, perfumes, incense and lamps; the offerings are made to them according to the ritual.

170b-172 Next, twenty-five pitchers are placed above this, adorned with cloth and surrounded by jewels, gold and braids; they have lids, are flawless and are without holes; they are filled with *hāṭaka* water. They are arranged according to the *upapīṭha* diagram, once (each of the gods of the diagram) has been invoked by the pronouncing of his name in a formula beginning with OṂ and ending with *namas*.

65. Cf. *Ajita* 15.4 sq.

66. *Vardhaki*: cf. 5.22. In this sentence the *guru*, *yajamāna* and *vardhaki* are all designated in the nominative; however verbs are in singular, which shows well that the *guru* is officiating while the others are only his assistants.

67. Cf. *Ajita* 15.14 sq.

68. About the *aṅkurārpaṇa* see e.g. *Ajita* chapter 35.

कलशस्योत्तरे पार्श्वे [262]दर्भासनपरिस्तरे ।
चतुष्प्रदीपसंयुक्ते सर्वमङ्गलशोभिते ॥ १७३ ॥
पूतचेता विशुद्धात्मा स्थपतिर्व्रतमास्थितः[263] ।
[264]पीत्वा शुद्धं पयो रात्रावुपोष्याधिवसेत् ततः ॥ १७४ ॥
प्रासादस्याग्रतो यागमण्डपं विधिनाचरेत् ।
चतुर्द्वारसमायुक्तं चतुस्तोरणभूषितम् ॥ १७५ ॥
वासोभिर्दर्भमालाभिः [265]स्रक्सुमैः समलङ्कृतम् ।
तन्मध्ये वेदिकां कुर्यात् [266]तद्व्यासत्र्यंशमानतः ॥ १७६ ॥
चतुरश्रं चतुर्दिक्षु विदिक्ष्वश्वत्थपत्रवत् ।
सुरेन्द्रेशानयोर्मध्ये कुण्डमष्टाश्रमिष्यते ॥ १७७ ॥
त्रिमेखलासमायुक्तं [267]वैकमेखलयान्वितम् ।

[कुम्भस्थापनम्]

स्थापको मूर्तिपैः सार्धं विधिना होममाचरेत् ॥ १७८ ॥
शालिभिः स्थण्डिलं कृत्वा वेदिमध्ये विचक्षणः ।
मूर्तिकुम्भं [268]न्यसेत् सम्यग् बीजमन्त्रमनुस्मरन् ॥ १७९ ॥
[269]प्रासादस्य चतुर्दिक्षु वृत्तकुण्डविधानतः ।
सन्तर्प्य स्थापको जातवेदसं निवसेत् तदा ॥ १८० ॥
विमानं [270]जन्मतः स्थूपिकान्तं वस्त्रैर्निवेष्टयेत् ।
[271]कुशास्तीर्णैर्नवैर्वस्त्रैः स्थूपिकीलमलङ्क्रियात् ॥ १८१ ॥

262. E et F : दर्भाम्बरपरिस्तरे
263. F : स्थपतिर्वरबेरधृक्
264. F : पक्वां
265. C : स्रग्भिश्च; E : स्रग्दामैः; F : सुक्लदामैः
266. F : तस्य सूत्र्यंशमानतः
267. F : एक
268. C : न्यसेत् तस्य; F : न्यसेद धर्म्यं
269. F : omits 180-213.
270. E : सद्मनः
271. C : कुशास्तैर्नवैर्वस्त्रैः; E : कुशाचान्नवर्भिर्वस्त्रैः

173-174 Then the architect whose mind is pure, whose soul is stainless and who is faithful to his vow, drinks pure water, undertakes a fast and settles himself to the north of the vases on a spread of *darbha* surrounded by four lamps and a complement of auspicious objects.

175-176a In front of the temple a sacrificial pavilion[69] is to be built according to rule; it has four doors, each adorned with an arch, and it is decorated with cloth, garlands of *darbha* and crowns of flowers.

176b-178a An altar is established in the middle; its width is a third that of the pavilion; at the four cardinal points are square fire pits whilst those at the intermediate directions are shaped like peepul leaves;[70] lastly, half way between the place of Surendra and that of Īśa,[71] is one octagonal one; they are all provided with one or three levels of steps.

Putting the mūrtikumbha in place[72]

178b-179 The *sthāpaka* accompanied by the 'guardians of the images' is to perform the oblations according to the ritual; this sage, after establishing a sacrificial area of unhusked rice in the middle of the altar disposes there the *mūrtikumbha* bearing the basic formula[73] in mind.

180 Then the *sthāpaka* puts fire in circular fire pits at the four cardinal points of the temple.

181 Then the temple is to be 'dressed' in cloth from base to finial whilst the finial's axis is adorned with new cloth interwoven with *kuśa*.

69. *Yāgamaṇḍapa*: for a detailed description see below 25.4 2 sq. where is also given a precise description of the firepits (*kuṇḍa*).

70. *Aśvatthapatravat*: this *kuṇḍa* is more often deemed as 'vulva shaped firepit' (*yonikuṇḍa*, cf. 25.47).

71. That is to say between East (Surendra) and North-East (Īśa).

72. *Mūrtikumbha*: these vases 'contain' the gods who will be transferred from them to the images.

73. *Bījamantra* (see below v. 201: *prāsāsabījamantra*): cf. H. Brunner, *Somaśambhupaddhati*, vol. 1, pp. xxxii-xxxiii.

[वास्तुदेवताबलिः]

[272]बल्यन्नं पायसान्नं च मुद्गान्नं च यवान्नकम् ।
कृसरं गुलशुद्धान्नं पीतं कृष्णं तथारुणम् ॥ १८२ ॥
गृहीत्वा [273]सकलस्याग्रे हेमपात्रे निधाय च ।
दधिदुग्धघृतक्षौद्ररत्नपुष्पाक्षताम्बुभिः ॥ १८३ ॥
[274]कदलीफलसंयुक्तं पात्रं चैवान्यशिल्पिभिः ।
धारयित्वाम्बुभी रात्रौ वास्तुदेवबलिं चरेत् ॥ १८४ ॥

[चक्षुर्मोक्षणम्]

ततः प्रभाते विमले नक्षत्रकरणान्विते ।
स्थपतिर्वरवेषाढ्यः प्राप्तपञ्चाङ्गभूषणः ॥ १८५ ॥
धृतहाटकयज्ञोपवीतः श्वेतानुलेपनः ।
[275]श्वेतपुष्पशिरःप्राप्तोष्णीषश्चाहतवस्त्रयुक् ॥ १८६ ॥
[276]दिशामूर्त्यपरांश्चक्षुर्मोक्षणं विधिनाचरेत् ।
[277]स्नापयेत् कलशाम्भोभिरर्चयेद् गन्धपुष्पकैः ॥ १८७ ॥
प्रथमं [278]हेमया तत्र सूच्या नयनमण्डलम् ।
लिखित्वा तीक्ष्ण[279]शस्त्रेण मण्डलत्रयमुल्लिखेत् ॥ १८८ ॥
आच्छाद्य नववस्त्रेण ब्राह्मणान् धान्यसञ्चयान् ।
धेनुं सवत्सां कन्यां च दर्शयित्वा यथाक्रमम् ॥ १८९ ॥

[सम्प्रोक्षणम्]

विमानं पुनरारुह्य स्थपतिः स्थापकाज्ञया ।
शङ्खकाहलतूर्यादिघोषणैः स्वस्तिवाचनैः ॥ १९० ॥

272. E : बल्यं तत्
273. C : सकलस्याग्रं
274. E : omits 184a.
275. C : श्वेतपुष्पाम्बरः
276. C : दिशं मूर्त्या
277. A (var), E : स्थापयेत्
278. E : सुवर्णन्त- instead of हेमया तत्र
279. E : मन्त्रेण for शस्त्रेण

Offerings to the divinities of the site[74]

182-184 The *sthāpaka* must then select the food for the offering: milk rice, cooked beans and barley, sesame rice, white (rice) with molasses, yellow (rice), black and red (rice); he lays all this before the god in a gold vessel with curds, milk, ghee, honey, gems, flowers, rice and water; in the evening, carrying this vessel and a banana, and accompanied by his assistants, he makes an offering to the gods, protectors of the site, with these liquids.

The opening of the eyes[75]

185-187a Later, one morning, the sun being without spots, during the auspicious lunar month and fortnight, dressed in fine clothes, adorned on the five parts of his body, wearing a thread of gold and white ointment, his head wrapped in a turban and covered with white flowers, wearing clothes that have never been washed, the architect, following the ritual, performs the ceremony of the opening of the eyes. (He must do it) for the divine images who are at the cardinal points and for the others.

187b-188 He must first bathe (the image) in water from the vases and pay it homage with perfumes and flowers. Next, with a gold point, he draws the first circle of the eye and then, with a sharp point he draws the other three.

Consecration

189-190a Subsequently, having covered the piles of grains for the brahmins with new cloth and having displayed in turn, a cow, her calf and a maiden, the architect, at the command of the *sthāpaka* goes once more (to the summit) of the temple.[76]

190b-191 To the sound of conches, drums and other musical instruments, whilst cries of good omen are raised, he hangs great banners at the four cardinal

74. *Vāstudevabali*: the offering prescribed here is different from that described in chapter 8.

75. *Cakṣurmokṣaṇa*: this ritual is bringing life into the images which then become the gods they represent. Cf. e.g. *Ajita* 41.9 sq.

76. The architect has gone up to the top of the temple a first time when he was setting in place the crowning bricks.

[280]स्थूप्यग्रादाप्रकृत्यन्तं चतुर्दिशि महाध्वजम् ।
लम्बयेत् क्षौम[281]पट्टैर्वा कार्पासैर्ग्रथितं नरम् ॥ १९१ ॥
चन्दनागरुतोयेन सर्वगन्धोदकेन च ।
कलशोदैः कुशाम्भोभिरुपरिष्टात् समन्ततः ॥ १९२ ॥
प्रोक्षयेत् स्थपतिः प्राज्ञो भुवनाधिपतिं जपेत् ।

[स्थूपिकुम्भः]

[282]तैतलानां विमानानां पाञ्चभौतिकसंश्रितात् ॥ १९३ ॥
स्थूपिकुम्भं सुवर्णेन ताम्रेण रजतेन वा ।
[283]उपलेष्टक[284]सौधैर्वा कृत्वेष्टं कीलवत् स्मृतम् ॥ १९४ ॥
सुसंस्थाप्याचलं यावत् प्रोक्षयेद् गन्धवारिणा ।
विमानादवरुह्याथ गर्भगेहं च मण्डपम् ॥ १९५ ॥
प्रोक्षयित्वा मुखे स्थित्वा नत्वा देवं वदेदिदम् ॥
धाराधिपातात् सलिलप्रकोपाद्
[285]दंष्ट्रया निपातात् पवनप्रकोपात् ।
अग्नेश्च दाहान्मुषितापचाराद्[286]
रक्षत्विदं सद्म शिवं च मेऽस्तु ॥ १९६ ॥
निरुजा मुदिता सधना प्रथिता
यशसा महदद्भुतवीर्ययुता ।
सततं निरुपद्रवकर्मयुता
पृथिवी पृथु जीवतु धर्मविधेः ॥ १९७ ॥

280. E : स्तूप्यग्रहीता प्रत्यन्नश्चतुर्दश महाध्वजम्
281. E : चित्रैर्वा
282. E : तैतिलानां शारीरस्य पश्चिभूतिकसंज्ञितम्
283. A (var) : उपलेष्टकया सौधैर्वा कृत्वाष्टं कीलवत् सुतम् ।
284. E : सौख्यैर्वा
285. C : दंस्त्रा
286. C : मुषिताभिचाराद्

points which reach from the tip of the finial to the ground and which are hung, by braids of linen or cotton, from (the image of) a man.

192-193a Then the wise architect makes a libation, sprinkling the sap of sandalwood and agalloche, perfumed water of all fragrances, as well as the liquid contained in the pitchers and *kuśa* water; in doing this he invokes the Master of the World.

The vase of the finial[77]

193b-194 The vase of the finial of a temple is made with the five elements mixed together or with gold, silver or copper, stone, bricks or stucco; it should be conceived in relation to the axis.

195 After the vase has been solidly placed, (the architect) consecrates it with perfumed water then, coming down from the roof, he consecrates the sanctum and the pavilion (in front of it);[78] at the end he stands before the god and, bowing, says this:

196 "O guard[79] this house against collapse, against deluges of rain, against blows from elephants, against attacking winds, against burning fire and the crimes of thieves. Be favourable to me !"

197 "In good[80] health, happy, rich, renowned, glorious, full of marvels and great exploits, eternal place of rites that are not inauspicious, let the Earth live ever in the ways of Dharma!"

77. See above v. 82 sq.

78. That *maṇḍapa* is the *mukhamaṇḍapa* described below (19.4 sq.).

79. Verse 196 = 28.23.

80. Verse 197 = 28.22.

ब्रह्मा विष्णुः शङ्करः सर्वदेवाः
क्षोणी लक्ष्मीर्वाग्वधूः सिंहकेतुः ।
ज्येष्ठा विश्वेदेवदेव्यः [287]प्रजानां
श्रीसौभाग्यारोग्यभोग्यं कृषीरन् ॥ १९८ ॥
[288]उक्त्वैवं स्थपतेः कर्मण्यत्रैव परिनिष्ठिते॥ १९९ ॥
स्थापको विधिना शुद्धिं कुर्याद् यागादिकर्मभिः ।
प्रोक्षयित्वा घटाम्भोभिः पञ्चगव्यैः कुशोदकैः ॥ २०० ॥
अर्चयेद् गन्धपुष्पाद्यैर्नैवेद्यं च प्रदापयेत् ।
[289]प्रासादबीजमन्त्रांस्तु न्यसेत् [290]सौधाधिदेवताम् ॥ २०१ ॥

[दक्षिणादानम्]

[291]प्रासादाभिमुखे स्थित्वा यजमानः प्रसन्नधीः ।
स्थपतेर्धर्मसर्वस्वं क्लेशेन सह यद् भवेत् ॥ २०२ ॥
तत् सर्वं परिगृह्णीत सुप्रीत्या स्थापकाज्ञया ।
पूजयेत् तु [292]यथाशक्ति स्थापकं स्थपतिं ततः ॥ २०३ ॥
पुत्रभ्रातृकलत्रैश्च यजमानो मुदा धनैः ।
धान्यैश्च पशुभिर्वस्त्रैर्वाहनैर्भूमिदानकैः ॥ २०४ ॥
शेषानपि च तक्षादिविष्टिसर्वान् स कर्मणि ।
सन्तर्पयेद्धिरण्यैश्च वस्त्रैर्वाऽपि मनोहरैः ॥ २०५ ॥
विमानस्थूपिकास्तम्भमण्डपालङ्कृतान्यपि ।
वस्त्रादीनि ध्वजं धेनुं प्रीत्या स्थपतये ददेत् ॥ २०६ ॥

[सम्प्रोक्षणावश्यकता]

एवमेवं कृतं वस्तु वर्धयेन्नित्यमा युगात् ।
यजमानस्त्विहामुत्र फलं सम्यग् लभेद् दृढम् ॥ २०७ ॥

287. C : प्रसन्नाः
288. E : उक्ते यत्
289. C : प्रासादबीजमन्त्रं तु
290. E : सौरादिदेवता
291. E : प्राङ्मुखाभिमुखः
292. E : यथाशक्त्या

198 "May Brahmā, Viṣṇu, Śaṅkara and all the gods as well as Kṣoṇī, Lakṣmī, Vāgvadhū, Siṃhaketu, Jyeṣṭhā and all the goddesses bestow upon creatures, happiness, well being, absence of passion and health!"

199 These words being pronounced, the architect's work is accomplished.[81]

200-201 The *sthāpaka* now does the purification according to the rule and with the aid of rites such as sacrifice;[82] after making a libation with liquids from the vases, the five products of the cow and with *kuśa* water, he must give thanks with perfumes, flowers and offerings of food. It is then that he imposes '*prasāda*', the principal formula on He who is the chief deity of the temple.[83]

Honoraria

202-203a It is then that the donor, standing in front of the temple with a serene mind, takes responsibility, with a joyous heart and following the instructions of the *sthāpaka,* for the fruits, beneficent or not, (of the work) of the architect.

203b-204 Then he must honour the *sthāpaka* and architect to the utmost; in company with his sons, his brother and his wife, this donor joyously showers them with money, grains, cattle, clothes and land.

205 As for the other craftsmen of the construction, such as the *takṣaka*, they will be satisfied with pieces of gold and fine clothes.

206 It is with great pleasure that he presents the architect with the decorations of the temple, finial, pillars and pavilion as well as with the cloth, the banner and the cow.

The necessity for the consecration ritual

207-208 A building where the procedure is thus will prosper (beyond) the Yuga and the donor will derive outstanding rewards in this world and

81. Afterward the architect will give away the building to the donor who will take responsibility for it (vv. 202-203).

82. By these rites the *sthāpaka* atones for all faults in construction work, of which the consequences may be very important (cf. 7.55, 9.81-82, etc.).

83. *Prāsādabījamantra*: see above v. 179 and *Ajita* 40.113-114.

अन्यथा चेत् फलं नैव लभते तत्र वस्तुनि ।
भूतप्रेतपिशाचादिराक्षसाश्च वसन्त्यलम् ॥ २०८ ॥
तस्मात् प्रासादनिष्पन्ने सर्वथा प्रोक्षणं चरेत् ।
मण्डपे च सभायां वा रङ्गे विहारशालके ॥ २०९ ॥
हेमगर्भसभायां तु तत्तुलाभारकूटके ।
विश्वकोष्ठे[293] प्रपायां च धान्यागारे महानसे ॥ २१० ॥
वास्तुदेवबलिं दत्त्वाधिवास्य विधिना तथा ।
स्थपतिः पूतचित्तात्मा प्राप्तपञ्चाङ्गभूषणः ॥ २११ ॥
नवाम्बरधरश्चैव नववस्त्रोत्तरीयकः ।
सर्वमङ्गलघोषैश्च जलसम्प्रोक्षणं चरेत् ॥ २१२ ॥

[सम्प्रोक्षणकालः]

उत्तरायणमासे तु कृतं चेदुत्तमोत्तमम् ।
त्वरितेऽप्येवमेवं तु कुर्यात् तद् दक्षिणायने ॥ २१३ ॥
त्रिरात्रमेकरात्रं वा [294]सद्योऽधिवासमेव वा ।
[295]तत्रैवाविकले द्रव्ये लभेत् कर्ता महत् फलम् ॥ २१४ ॥

293. E : प्रभावाश्च

294. F : सर्वे

295. F : तत्रैवाविकलैः द्रव्यैः

the next. If he proceeds otherwise there is no reward and only Bhūta, Piśāca and Rākṣasa will inhabit the building.

209-210 A consecration should always be carried out in a temple once finished and this is so for pavilion, hall, theatre, monastery, hall for gold embryo ritual, building for ritual weighing, *viṣvakoṣṭha*, shed, *dhānyāgāra* and *mahānasa*.[84]

211-212 The architect performs that consecration according to the ritual, once he has made an offering to the gods who protect the site; his soul and his thoughts must be pure, the five parts of his body adorned and his upper and lower garments new. He performs the consecration by water to the accompaniment of cries of good omen.

The time for the consecration

213 It is an excellent thing to perform the consecration in a month when the solar course is to the north, though it may also be done when the solar course is to the south if there is any urgency.[85]

214 If the building is perfectly finished,[86] three days or one day (after its completion) or on the very day (of that completion), he who is responsible and who wishes to benefit considerably must install the diety.

84. *Sabhā*: 'hall', see 25.198 sq.; *raṅga*: 'theatre', but it may be also the 'dancing pavilion' which is one of temple annexes (*nṛttamaṇḍapa*, 23.72-73); *vihāraśālaka*: a monastic building described in chapter 26 (vv. 200 sq.): *hemagarbhasabhā* and *tulābhārakūṭa*: see 29.205-25; *viśvakoṣṭha*: see chapter 9 note 60; *prapā*: 'shed' or 'light pavilion', cf. chapter 2 note 6: *dhānyāgāra* and *mahānasa*: they may be the reserve and the kitchen of the temple as well as the principal main buildings of, houses intended respectively for vaiśya and kṣatriya (see 27.18b-19 and note *ad loc.*; for *mahānasa* = *annālaya* see ibid.).

85. Thus the building may be completed as it may be started at any time during the year as well (cf. chapter 6 note 2).

86. *Avikale dravye*: 'without any incomplete material'.

[कलशस्थापनम्]

एकत्रिपञ्च[296] कलशेषु तथाधिदेवा
एकत्रिपञ्च कथिता इह [297]मूर्तयस्ताः ।
तत्तत् [298]स्वमन्त्रसहितं तदधः सहेम-
रत्नं निधाय विधिना कलशान् न्यसेत् तत् ॥ २१५ ॥
एवं मुदा भवनकर्मसमाप्तिमत्र
कुर्याज्जनेशजनगोकुलसम्पदृद्ध्यै ।
यद् वैपरीत्यमसमाप्तिकवस्तुवेशं
तद् वास्तुदेवबलिहीनमनर्थदं स्यात् ॥ २१६ ॥

इति मयमते वस्तुशास्त्रे शिखरकरणभवनकर्मसमाप्तिविधानं नाम
अष्टादशोऽध्यायः

296. F : कलिङ्गेषु
297. E : मूर्तिवस्ताः
298. E : सुमन्त्र-

The putting in place of the vases

215a Depending on whether there are one, three or five vases, (the temple has one, three or five) principal deities and there must be one, three or five images.[87]

215b Each vase is arranged whilst the formula fitting to the corresponding deity is pronounced and after precious stones and gold have been placed underneath.

216 This is how a building is happily finished, such as will increase the fortunes of the owner, his family, his people and his cows. If these rules are broken, if an unfinished building is entered, if the tutelary deities are deprived of their offerings, nothing is gained but misfortune.

Thus ends, in the *Mayamata*, treatise on dwelling,
the eighteenth chapter: RULES FOR THE MAKING OF
ROOFS AND FOR THE END OF THE BUILDING WORK.

87. The *kalaśa* mentioned here are probably the *mūrtikumbha* (above v. 178 sq.) used in the consecration ceremony and of which the number varies according to that of the gods to be installed. However, a parallel passage found in *Īśānaśiva* (Kriyā. 34.23-25a) seems to imply that they are finial vases or more precisely finials (see above note 31), which would be as many as the gods in the temple:

स्तूपिकाच्छादनं कुम्भं स्तूप्याकारशिखं न्यसेत् ।
ऋजुमालाग्रविन्यासमेकं त्रीन् वाथ पञ्च वा ॥
तदानुगुण्यतो मूर्तिं मूर्तिर्वा मन्त्रतो न्यसेत् ।
एकस्मिंच्छिव एव स्यात्त्रये ब्रह्महरीश्वराः ॥
ब्रह्माद्यास्तु सदेशान्ताः स्थाप्याः स्युः कुम्भपञ्चके ॥

अथैकोनविंशोऽध्यायः

[एकभूमिविधानम्]

[1]एकभौमं चतुर्मानं वक्ष्ये संक्षिप्य शास्त्रतः[2] ।
त्रिचतुर्हस्तमारभ्य नव[3] पङ्क्त्यन्तविस्तृतम् ॥ १ ॥
[4]तारे सप्तदशोत्सेधमध्यर्धं तत्त्रिपादकम् ।
द्विगुणं तु तदुत्सेधं शान्तिकं [5]पौष्टिकं भवेत्[6] ॥ २ ॥
जयदं चाद्भुतं चैव चतुर्धोदयमीरितम्[7] ।
[8]चतुरं वृत्तमायामं द्व्यश्रवृत्तं[9] षडश्रकम् ॥ ३ ॥
अष्टाश्रमाकृतिर्ह्येषां शिखरेऽपि तथैव च ।

[मुखमण्डपम्]

समं त्रिपादमर्धं वा मुखमण्डपमिष्यते ॥ ४ ॥
[10]समं तन्मण्डपं तस्य सान्तरालं सवेशकम् ।
युग्मस्तम्भसमायुक्तं युक्त्या सर्वाङ्गशोभितम् ॥ ५ ॥

1. D : एकद्वित्रिचतुर्मानं; E, F : एकभूमिं
2. F : सङ्क्षेपतः क्रमात्
3. F : पञ्चान्तु for पङ्क्त्यन्त-
4. E : तारे सप्तदशोत्सेधं मध्यर्धं तत्रिरभागिकम्
5. F : पैष्टकं for पौष्टिकं
6. D, E, F : तथा
7. D adds : उपानादिस्थूपिपर्यन्तमुत्सेधशन्तिकम्
8. D : चतुरश्र-
9. F : च तु वृत्तं instead of द्वयश्रवृत्तं
10. D : समन्तमण्डपं; F : समं तु मण्डपं

CHAPTER 19

ONE STOREYED TEMPLES [1]

1-3a Here, briefly and in accordance with the treatises, I present one storeyed temples (for which) there are four series of possible dimensions; their width goes from three to nine cubits or from four to ten.[2] Their height may be ten sevenths their width or one and a half, one and three quarters or twice it; these four types of proportions are called *śāntika, pauṣṭika, jayada* and *adbhuta*.[3]

3b-4a Their plan may be square, circular, rectangular or elliptic, apsidal,[4] hexagonal or octagonal and the same plans are suitable for their roofs.[5]

The pavilion in front of the shrine[6]

4b-5 The pavilion in front of the shrine is the same (width) as the shrine or it is three quarters or half (that width). If there is a covered passage (linking pavilion and temple) and a porch, the pavilion is then the same (width) as the (temple). The pavilion is provided with an even number of pillars arranged symmetrically and it comprises all the prescribed elements.[7]

1. Chapters 19 to 22 are dedicated to be descriptions of temples (*prāsāda* . . etc. see below v. 10-12) of which the annexes (enclosure walls, secondary shrines, gateways, pavilions. . .) will be dealt with in chapters 23 to 25. Descriptions of buildings are often mixed with those of decorative elements. For one storeyed temples see *Mānasāra* (chapter 19), *Ajita* (12.21 sq.) and *Śilparatna* (37.1-13).
2. See above 11.3.
3. *Śāntika*. . .: see above 11.8-9 where the same classification is found, with slight differences however.
4. *Dvyaśravṛtta* (= *hastipṛṣṭha, gaja*°, etc.) cf. chapter 11 note 2; for descriptions see below vv. 32 and 20.26, 21.15 sq., 21.23 sq., 21.34 sq.
5. The plan of the roof may be different from that of the building itself (see below vv. 37.38, 20.29, etc.).
6. *Mukhamaṇḍapa*: other descriptions are given below (21.18sq., 25.188-89). Built in front of the door of the temple main building (which contain the sanctum, *garbhagṛha*), this pavilion is most often connected to it by a covered passage (*antarāla*). It appears as a kind of nave where are accomplished several rites which cannot be enacted in the sanctum due to its exiguity. Cf. Dagens 1984 pp. 91-93.

सार्धहस्तं द्विहस्तं वा प्रासादस्यांशमेव वा ।
अन्तरालस्य विस्तारं द्विदण्डं तस्य वेशनम् ॥ ६ ॥
सावकाशान्तरालं चेद् द्वित्रिहस्तान्तरं तु वा ।
पार्श्वे सोपानसंयुक्तं हस्तिहस्तविभूषितम् ॥ ७ ॥
[11]धाम्नः कुड्यस्यार्धकं तत्समं वा
पादोनं वा भित्तिविष्कम्भमानम् ।
पार्श्वे चैतद्[12] द्वित्रिदण्डैस्तु वेशं
कुर्यादग्रे मण्डपस्यास्य धीमान् ॥ ८ ॥
[13]तत्युन्नतायतकरेषु च हस्तमाना-
द्धीनं त्रिपादकरमर्धमथापि पादम् ।
तत्रैव वस्तुनि [14]यथोचितमाचरेद् वै
हानिं च वृद्धिकमनिन्द्यमनेकशास्त्रैः ॥ ९ ॥

[धामपर्यायनामानि]

विमानं भवनं हर्म्यं सौधं धाम निकेतनम् ।
प्रासादं सदनं सद्म गेहमावासकं गृहम् ॥ १० ॥
[15]आलयं निलयं [16]वासमास्पदं वस्तु वास्तुकम् ।
क्षेत्रमायतनं वेश्म मन्दिरं धिष्ण्यकं पदम् ॥ ११ ॥
लयं क्षयमगारं च तथोदवसितं पुनः ।
स्थानमित्येवमुक्ताश्च पर्यायाख्या हि पण्डितैः ॥ १२ ॥

11. F : places verses 8 to 20 between 28a and 28b.
12. E, F : चैक-
13. F : तद्य-
14. E : हितोचितम्
15. F : आलयं निलयं चैवमास्पदं वस्तुवास्पदम्
16. D : वस्तु आस्पदं (!)

6-7 The width of the covered passage is one or two cubits or it is proportional to the dimensions of the temple; it is two modules long;[8] if it comprises a porch, the width of that porch is two or three cubits and there is, on the side, a stairway decorated with an elephant's trunk (serving as handrail).[9]

8 The thickness of the walls (of the pavilion and covered passage) is equal to that of the walls of the shrine or is three quarters or half that width.[10] The sage is to establish a porch, with two or three modules (of projection), on the side and on the front of the pavilion.

9 When calculating the width, height and length in cubits a distance of less than a cubit may be subtracted, (that is) three quarters, half or a quarter of a cubit but the procedure, in that case, is as for the (main) building; some treatises forbid any increase or diminution.[11]

Synonyms designating buildings

10-12 ***Vimāna, bhavana, harmya, saudha, dhāman, niketana, prāsāda, sadana, sadman, geha, āvāsanaka, gṛha, ālaya, nilaya, vāsa, āspada, vastu, vāstuka, kṣetra, āyatana, veśman, mandira, dhiṣṇyaka, pada, laya, kṣaya, agāra, udavasita***, and ***sthāna***, these terms are synonyms according to the sages.[12]

7. That is to say that it comprises three levels of elevation (base, level of pillars and entablature, see 25.25); these elements are to be similar to that of the temple to which the pavilion is attached (25.188).
8. *Veśana*: literally 'projection'; the length of the covered passage is its projection in relation to the *pramāṇasūtra* of the temple itself (cf. *Śilparatna* 39.6b-7a).
9. *Hastihastavibhūṣita*: the handrail gets often the form of an elephant's trunk, hence the use of *hastihasta* to designate it (see below 21.96).
10. Cf. *Śilparatna* 39.11:

    प्रासादभित्तिविस्तारतुल्यं वार्धत्रिपादकम् ।
    अन्तरालस्य भित्तेस्तु व्यासं स्यान्मण्डपे तथा ॥

11. Such increase or diminution aims to accord the chosen dimensions with the *āyādi* rules (cf. 9.18 sq.).
12. This list of synonyms shows that a limited importance is to be attached to the use of such or such term of which the choice depends often on stylistical or metrical considerations.

[गर्भगृहमानम्]

[17]हर्म्यतारत्रिभागैकं भूतांशेषु गुणांशकम् ।
धातुभागे युगांशः स्याद् बाणांशं नवभागिके ॥ १३ ॥
रुद्रांशे रसभागं तु धातु त्रयोदशांशके ।
तिथ्यंशे वसुभागं तु [18]सप्तदश नवांशकम् ॥ १४ ॥
विस्तारार्धं तु ते सर्वे नालीगृहविशालताः[19] ।

[स्थूपिकामानम्]

[20]फलिके पञ्चभागे तु [21]युगार्धं पद्मविस्तृतम् ॥ १५ ॥
पद्मतारत्रिभागैकं [22]कुम्भतारमिति स्मृतम् ।
[23]कुम्भतारत्रिभागैकं कुम्भस्याधो वलग्नकम् ॥ १६ ॥
वलग्नस्य त्रिभागैकं कुम्भस्योपरि कन्धरम् ।
कन्धरत्रिगुणं[24] पाली तत्त्रिभागेन कुड्मलम् ॥ १७ ॥

17. F : प्रासादत्रिंश एकं तु
18. C : सप्तादश
19. A (var), D and E add long passage between 15a and 15b (see translation, note *ad loc.*)
20. A (var) : पल्लके; E : फलके
21. E : युगंशौ
22. E : कुम्भान्तरम्
23. C : places 16b-17a after 18a.
24. D : फली

Dimensions of the sanctum[13]

13-15a Here are all the possible widths for the sanctum calculated from the width of the temple: one third, three fifths, four sevenths,[14] five ninths, six elevenths, seven thirteenths, eight fifteenths, nine seventeenths or one half.

Proportions of the finial[15]

15b-16a The diameter of the lotus (which is at the bottom of the finial) is two tenths that of the top of the roof.[16] It is prescribed that the diameter of the vase (of the finial) be a third that of this lotus.

16b-17 The diameter of the recessed part under the vase is a third that of the vase; that of the groove which is above the vase is a third that of the

13. *Nālīgṛha* ('hollow house') or *garbhagṛha* ('house of the embryo', 'house of the matrix') designate the sanctum which is placed at the centre of the *prāsāda* and contains the image of the god, lord of the temple; for a description see *Ajita* 12.12-17 (cf. Dagens 1984 pp. 89-90).
14. *Dhātu* is used here with a numerical value of 'seven' (for there are seven *dhātus* in the body; chyle, blood, flesh, fat, bone, marrow and semen); elsewhere (e.g. 14.21) that value is often 'five' (for the five *bhūtas* are also called *dhātu*).
15. Cf. 18.82 sq. There is here a break in the course of the text. One of the manuscripts used by Trivandrum editor (Ms. G) contains, between half-verses 15a and 15b, thirteen verses reproduced by that editor in a note. Same verses are found in our manuscript D. In both cases their text is extremely corrupt: the first verses seem to give a method for calculating the diameter of a pillar; afterwards is given a set of proportions related to several elements of the top part of the building, the last one being called '*palla*': that *palla* is probably a corrupt form of *phalika* found here at the beginning of verse 15b.
16. *Phalika*: literally 'mountain', hence 'top of the roof' which is like the summit of a mountain. The lotus placed at the top of the roof is dealt with in chapter 18 (vv. 18-19).

समं त्रिपादमर्धं वा महानासीविनिर्गमम् ।
[25]तद्व्यासत्रिचतुर्भागहीनं स्कन्धान्ततुङ्गकम् ॥ १८ ॥
[26]शक्तिध्वजं तदर्धोच्चं त्रिपादं वा विधीयते ।
[27]कन्धरोच्चत्रिभागकं वेदिकोदयमीरितम् ॥ १९ ॥

25. E : तं

26. E : शक्तिध्वजं तदूर्ध्वोच्चं क्षेपणं च भागिकम्

27. E : adds before 19a.
ग्रीवमर्धेन कम्पं स्यात् त्रिपादं विधीयते

recessed part; that of the slab (above) is triple that of the groove and that of the lotus bud is a third that of the slab.[17]

18-19a The projection of the large false dormer windows[18] (set in the roof) is equal (to their width) or is three quarters or half of it; their height

17. We have here a simplified description of the finial where several mouldings listed in 18.83 sq. are grouped together; the following table summarizes both descriptions in parallel (see also chapter 18 note 30:)

Chapter 18	Chapter 19
mukula (lotus bud)	*kuḍmala* (lotus bud)
vetra (3rd reed)	?
ambuja (4th doucine)	?
phalaka (slab)	*pālī* ('slab')
padma (3rd doucine)	
kampa (6th fillet)	
dhṛk (2nd supporting element)	
kṣepaṇa (5th fillet)	
vetra (2nd reed)	
kṣepaṇa (4th fillet)	*kandhara* (groove)
dhṛk (1st supporting element)	
kṣepaṇa (3rd fillet)	
paṅkaja (2nd doucine)	
ghaṭa (vase)	*kumbha* (vase)
paṅkaja (1st doucine)	
kṣepaṇa (2nd fillet)	
vetra (1st reed)	*valagna* (recessed part)
kṣepaṇa (Ist fillet)	
padma (lotiform base)	

Valagna literally means 'waist', 'middle', it appears here as a synonym to terms such as *kandhara* or *kaṇṭha* (literally 'neck', but used designate any recessed element); the same element is also called 'shoulder' (*skandha* v. 18).

18. *Mahānāsī*: the false-dormer windows, placed on the extrados of roofs or cornice, project like a 'nose', hence their name (*nāsī*, *nāsikā* . .); another term used to designate them is *nīḍa* ('nest'): it may be connected with the frequent designation of the cornice as *kapota* ('[place where nest] pigeons'); tam. *kūḍu* popularized by G. Jouveau-Dubreuil also means 'nest' (cf. Dagens 1984 pp. 81-82). All the terms applied to those false dormer-windows are also used to designate protruding elements, such as *pañjara*, aediculae of which the facade is crowned by a gable shaped like a dormer-window (see below note 28); that often makes descriptions quite confused.

सार्धदण्डं द्विदण्डं वा क्षुद्रनास्या विशालकम्[28] ॥

[द्वारम्]

पादोत्सेधे [29]पङ्क्तिनन्दाष्टभागे द्वारोत्सेधं तत्तदेकांशहीनम् ।
विस्तारं स्यात् तत्तदुच्चार्धमानं द्वारं कुर्याद्धर्म्यमध्ये नृपाणाम्[30] ॥ २० ॥
[31]योगव्यासं पादविष्कम्भमानं पादाधिक्यं [32]वा तदर्धं त्रिपादम् ।
बाहुल्यं स्यादुच्छ्रये वेदभागे बाह्ये [33]साब्जक्षेपणं तत्त्रिभागैः ॥ २१ ॥
[34]भित्तिव्यासे द्वादशांशे तु बाह्ये
पञ्चांशान्तद्वारयोगस्य मध्यम् ।
तद्वच्चान्तः स्तम्भमध्यं तयोस्त-
न्मध्यं प्रोक्तं भित्तिमध्यं विधिज्ञैः ॥ २२ ॥

[नालमानम्]

जन्मान्तं वा जगत्यन्तं कैरवान्तं गलान्तकम् ॥ २३ ॥
पट्टिकान्तं तलं पञ्चभेदं सर्वेषु धामसु ।
[35]छिद्रं विद्यादधश्चोर्ध्वे बाह्ये नालं प्रयोजयेत् ॥ २४ ॥

28. E : विभूषितम्
29. E : यञ्च
30. D, F : सुराणाम्; E : पुराणाम्
31. E : योगव्यधं; F : यग्यव्यासं
32. E, F : पादमर्धं
33. E.: सार्ध-
34. E : भक्ति
35. E : चित्रं

goes up to the recessed part (of the finial)[19] and is two thirds or three quarters their width and it is said, too, that the height (of the pole) for the standard is half or three quarters their height.

19b The height of the stereobate[20] of the attic is a third that of the attic itself and the width of the small false dormer windows (which decorate it) is a module and a half or two modules.

The door

20 The height of the door is nine tenths, eight ninths or seven eighths that of the pillars and its width is half its height.[21] The door is situated in the middle (of the facade wall) of the royal palace.[22]

21 The width of the door jambs is equal to the width of the pillars or to that width increased by a quarter; the thickness (of the door jambs) is half or three quarters their width. On the outside is a string course decorated with lotuses (of which the width) is three quarters of the thickness (of the door jambs).

22 The thickness being divided into twelve parts, the middle of the door sill is at a distance (from the exterior face) equal to five parts, the middle of the door jamb is at the same distance (from the other face) and the middle of the wall must be equidistant from these two points; thus do the sages prescribe.[23]

The gargoyle[24]

23-24 Whatever the type of temple, its (interior) floor should be at one of these five levels: (lower) plinth, (upper) plinth, doucine, dado or

19. *Skandha*: see above note 17.
20. *Vedikā*: see 16.31 (and note *ad loc.*) and 18.2.
21. Cf. 30.11b-12.
22. Cf. 30.43 where it is told that a door situated on the middle is suitable for gods, brahmins and kings only, while for the others it is to be off-centre.
23. That is to say that middles of wall, door sill and door jamb of that are not to be on the same line.
24. *Nāla* (*nālikā*): the role of this gargoyle is to allow the ritual liquids to flow out of the sanctum; having been in contact with the image of the god these liquids are dangerous and must be driven outside through a duct bored in the wall of the sanctum; it is at the end of that duct that the gargoyle is to be placed.

द्वादशाङ्गुलमारभ्य [36]त्रित्र्यङ्गुलविवर्धनात् ।
[37]चतुर्विंशाङ्गुलं यावदायामं पञ्चधा भवेत् ॥ २५ ॥
अष्टाङ्गुलं समारभ्य द्विद्व्यङ्गुलविवर्धनात् ।
तारं षोडशमात्रान्तं पञ्चधा परिकीर्तितम् ॥ २६ ॥
समं त्रिपादमर्धं वा [38]घनं छिद्रं तु मध्यमे ।
त्रिचतुष्पञ्चषण्मात्रं तारं तत्समनिम्नकम् ॥ २७ ॥
[39]मूलात् पञ्चत्रिभागं स्यादग्रं धारासमन्वितम् ।
[40]घटितं सिंहवक्त्रेण किञ्चिन्मूलान्नताग्रकम्[41] ॥ २८ ॥
एवं [42]नालं प्रकर्तव्यं वामे प्रासादमध्यमे ।
अन्तःपीठस्य नालस्य [43]समं वा बहिरिष्यते ॥ २९ ॥

[अलङ्करणम्]

विस्तारायाममुत्सेधं सर्वाण्यङ्गानि च क्रमात् ।
संक्षेपतः समादिष्टान्यलङ्कारमथोच्यते ॥ ३० ॥
वृत्तग्रीवामस्तकं वैजयन्तं श्रीभोगं स्यात् कर्णकूटोपयुक्तम्[44] ।
[45]मध्येभद्रं श्रीविशालं तदेव वस्वश्रं चेच्छीर्षकं[46] स्वस्तिबन्धम् ॥ ३१ ॥

36. E : द्विद्व्य-; F : द्वित्र्य-
37. F : चतुर्दशा-
38. D : धनछत्रन्तु; E, F : धनं चित्रं तु
39. E : मूलात् पञ्चत्रिभागैकमग्रं तारसमन्वितम्
40. E : घट्टितं; F : पट्टिकं
41. D : मूलं तथा क्रामम्
42. E : तालं
43. F : वमं
44. C : गुदम्
45. F : omits 31b.
46. D : शीरितं

stereobate.[25] There must be a duct through the wall. and a gargoyle positioned on the exterior whose (height) extends above and below (floor level).

25-28 Starting with twelve digits and proceeding to twenty-four by successive increments of three digits, five (possible) lengths are obtained; the five corresponding widths go from eight to sixteen digits by successive increments of two digits; the thickness is equal to the width or is three quarters or half of it. In the middle (of the gargoyle) is a duct, three, four, five or six digits wide and as deep as wide. The width (of the gargoyle) at its extremity is three fifths what it is at the beginning; this extremity is provided with a spout fashioned in the form of a lion's mouth and is slightly lower than the departure point.

29 A gargoyle like this is to be installed in the middle of the left facade of the temple; it may also be in the position, on the exterior, that the spout of the pedestal occupies inside.[26]

General appearance of temple

30 All the elements which are to be used in conjunction (in a building), with their widths, lengths and heights, have been given briefly and in order. The over-all look of the building will now be indicated.

31-32 If the roof and the attic are circular[27] then this is a temple of the

25. Cf. *Ajita* 13.14:

कैरवान्तं गलान्तं वा पट्टिकान्तं भेवत् स्थलम्।
उपपीठेऽथवा कुर्यात् स्थलं तद्दक्षिणोन्नतम्॥

26. The general rule given here is that the gargoyle is to be on the left side of the god. Most of the temples face east, then gargoyle is normally placed to the north. However several cases may occur: thus when the sanctum has doors to the four cardinal points, the gargoyle is generally in a corner. . .etc.

27. The form of ground plan is not indicated but it is probably square

[47]वेदाश्राभं तच्छिरः श्रीकरं स्याद् द्व्यश्रं वृत्तं हस्तिपृष्ठं हि नाम्ना[48]।
[49]ऋत्वश्राभं शीर्षकं स्कन्दकान्तं तत्तन्नाम्ना तत्तदायामयुक्ते ॥ ३२ ॥
मध्ये[50]भद्रयुतं कर्णकूटयुक्तं तु मस्तके ।
कोष्ठकं भद्रनास्यङ्गं वृत्तं वा [51]गलमस्तकम् ॥ ३३ ॥
[52]नाम्नैतत् केसरं प्रोक्तं युगाश्रं वा [53]गलं शिरः ।
[54]पञ्चसप्तर्तुभागे तु त्रिद्व्यंशैर्मध्यभद्रकम् ॥ ३४ ॥

47. F : देवाश्रमं
48. E : नामतः
49. D : षडश्राभं शीरिषं
50. E : नास्यन्तं for भद्रयुतं
51. F : गति-
52. E : नाम्ना तत्
53. F : गुलं
54. E, F : पञ्चसप्तन्तु

vaijayanta type; if there are corner aediculae[28] it is *śrībhoga*, if there is a forepart[29] (in the middle of the facade) this is *śrīviśāla* and if the roof is octagonal it is *svastibandha* but if it is square it is said to be *śrīkara*. If the plan is square but comprises an apse it is *hastipṛṣṭha*; if the roof is hexagonal it is *skandakānta*. These names are equally applicable (to plans which are similar) but elongated.

33-34 The *kesara* comprises a forepart in the middle of its facade. There are aediculae at the level of the roof, some at the corners and others in the middle; there is a false dormer-window above the forepart.[30] The attic and roof are circular or square; (the width and the projection of) the median forepart are respectively three and two fifths, three and two sixths or three and two sevenths (the width of the building).

28. *Karṇakūṭa*: aediculae placed on the top of entablature are a frequent decorative feature of multi-storeyed temples and gateways, especially in South Indian architecture (see Figs.15 and 16); they are of several sorts (cf. Dagens 1984 pp. 79-81) and hints about their characteristics are given here and there through chapters 20 to 22 (e.g. 20.10 sq.; 21.61-64; 22.76-92a, etc.). *Kūṭa* are square (octagonal, circular...) aediculae with a pyramid roof; they are most often placed at the corners of the building (even if that is not precisely indicated by the compound *karṇakūṭa*); they are also designated as *sabhā* (e.g. 22.4,17,18...) or as *sauṣṭhiku* ('pertaining to a well-established [building]' cf. e.g. 20.2, 9; 21.11, 42 ...). *Koṣṭha* (e.g. below v. 33) are elongated and covered by a wagon roof (hence their other name *śālā*, which term is applied to a building with such a roof); they are never placed at corners; there may be a single aedicula located on the middle of the facade (e.g. Fig. 15), or two placed side by side. *Kūṭa* and *koṣṭha* are most generally connected together by a miniature dwarf-gallery, which makes up like a 'chain' or a 'necklace' all round the building, hence its name: *hārā* (e.g. 20.3). A third type is that we call here 'intermediate aediculae' for they are placed between *kūṭa* and *koṣṭha* (thus interrupting the dwarf galleries); they are apsidal plan aediculae seen by their front facade and they look thus as 'niches'; they are designated as *pañjara*, literally 'cage, aviary', (e.g. 20.3) or by terms such are *nāsa* or *nīḍa* (see above note 18). The aediculae placed on temples superstructure are decorative elements; in the case of houses, features called *kūṭa, koṣṭha* (etc.) are outward rooms or similar elements (cf. e.g. chapter 26 note 45).

29. *Bhadra*: cf. Dagens 1984 p.74.

30. That forepart makes up the entrance of the temple; the false-dormer window forms a gable above its door.

[धामभेदाः]

नागरं द्राविडं चैव वेसरं च त्रिधां मतम् ।
[55]चतुरश्रायताश्रं यन्नागरं परिकीर्तितम् ॥ ३५ ॥
अष्टाश्रं च षडश्रं च तत्तदायाममेव च ।
[56]सौधं द्राविडमित्युक्तं वेसरं तु प्रकथ्यत ते ॥ ३६ ॥
[57]वृत्तं वृत्तायतं द्व्यश्रं [58]वृत्तं चान्यं प्रकथ्यते ।
[59]स्थूप्यन्तं चतुरश्रं यन्नागरं परिकीर्तितम् ॥ ३७ ॥
[60]ग्रीवात् प्रभृति वस्वश्रं विमानं द्राविडं[61] भवेत्[62] ।
ग्रीवात् प्रभृति वृत्तं यद् वेसरं तदुदाहृतम् ॥ ३८ ॥

[विमानतलदेवताः]

तले तले विमानानां दिक्षु देवान् न्यसेत् क्रमात् ।
[63]पूर्वायां द्वारपालौ तु नन्दिकालौ च विन्यसेत् ॥ ३९ ॥
दक्षिणे दक्षिणामूर्तिं पश्चिमेऽच्युतमेव हि ।
अथवा लिङ्गसम्भूतमुत्तरे तु पितामहम् ॥ ४० ॥
मण्डपे [64]मध्यदेशे तु दक्षिणे तु विनायकम् ।
तत्पूर्वे पश्चिमे वाऽपि नृत्तरूपं विशेषतः ॥ ४१ ॥
कात्यायनीमुदग्भागे क्षेत्रपालं तथैव च ।
स्थानकासनसंयुक्ता दिशामूर्तीर्न्यसेद् बुधः[65] ॥ ४२ ॥
विशेषेण कथोपेतं रूपाण्यपि विधानतः[66] ।
एवं मूलतले[67] प्रोक्तमुपर्युपरि वक्ष्यते ॥ ४३ ॥

55. E : चतुरश्रं चायताश्रं नागरं
56. F : सोधे
57. E : omits 37a.
58. F : सौधमन्यत् instead of वृत्तं चान्यं
59. F : omits 37b.
60. D : ग्रीवात् प्रतिवस्वश्रं; E : ग्रीवाप्रभृतिवृत्तं
61. A : द्रामिळं
62. D : भवत्
63. E : अयामद्वारापलित
64. D : मध्यभागे; E : मध्यभद्रे
65. E : क्रमात्
66. E : विधायताम्
67. E : तलं for तले

Classification of temples

35-38 There are three classes of buildings: *nāgara*, *drāviḍa* and *vesara*.[31] The square or rectangular building is called *nāgara*, the hexagonal or octagonal one, whether regular or elongated, is called *drāviḍa* and the circular, elliptic or apsidal one is called *vesara*. The building which is square up to the finial is also called *nāgara*, that which is octagonal from the attic *drāviḍa* and the one which is circular from the attic *vesara*.

Images on the temples

39-40 (Images) of the gods are arranged at the cardinal points on each storey of the temple. On the ground floor, in the east, are the two guardians of the door, Nandi and Kāla; in the south Dakṣiṇāmūrti, in the West Acyuta or Liṅgasambhūta and in the north Pitāmaha.

41-42a Vināyaka is at the centre of the facade of the pavilion which is before the shrine or he is to the south (of this pavilion); Nṛttarūpa is placed to the left or to the right of Vināyaka (on the southern face of the pavilion) and in the north there is Kātyāyanī or Kṣetrapāla.

42b-43 The prudent man places seated or standing images at the cardinal points; these images may either be isolated or set up in historiated panels.[32] The prescription for the ground floor is thus; what is suitable for the upper storeys, is now indicated.

44-45a Those to be installed on the second floor are Purandara or Subrahmaṇya in the east, in the south Vīrabhadra, in the west Nārasiṁha and in the north Vidhātṛ or Dhanada.

31. *Nāgara*. . . these terms are used to designate types of temple (see also 21.99 or 35.8 sq.) as well as types of Liṅga (33.40 sq.); they are found in several texts (cf. Dagens 1984 p. 94) and unjustifiable conclusion have been drawn from their pseudogeographical consonance; it appears in fact that they are no more than classificatory terms used with several implications: thus in chapter 21 (v. 99) *nāgara*, *drāviḍa*, and *vesara* temples are said to correspond respectively to *sattva*, *rajas* and *tamas*, as well as to brahmins, kings and vaiśya and to Śiva, Viṣṇu and Brahmā. On the other side, according to *Kāmikāgama* (I.45.136 sq.), *nāgara* temples are located to north, north-east or north-west of a town, *drāviḍa* temples to south, south-east or south-west and *vesara* temples to east or west, all of them being *drāviḍa*, that is to say Tamil. . .

32. Cf. *Īśānaśiva* Kriyā. 32.24:

रुद्रावताराक्रीडादिकथारूपाणि चैव हि।
मूलभित्तौ च परितो विन्यसेदुक्तलक्षणम्॥

पुरन्दरं न्यसेत् पूर्वे सुब्रह्मण्यमथापि वा ।
दक्षिणे [68]वीरभद्रः स्यान्नारसिंहश्च पश्चिमे ॥ ४४ ॥
उत्तरे तु विधाता स्याद् धनदो वा विधीयते ।
एवं द्वितलविन्यासं त्रितले तु मरुद्गणान् ॥ ४५ ॥
तले तलेऽमरान् सिद्धान् गन्धर्वादिमुनीन् न्यसेत्[69] ।
[70]षोडश प्रतिमाश्चैव[71] सर्वत्र परिकीर्तिताः ॥ ४६ ॥
ग्रीवाधस्तात् [72]प्रतेरूर्ध्वे कोणे कोणे वृषान् न्यसेत् ।
सर्वेषामपि देवानां तत्तद्वाहनमीरितम्[73] ॥ ४७ ॥
[74]प्रदक्षिणावृतं तस्य सर्वदेवालये तथा ।
इत्येवमादिभिर्युक्तं विमानं सम्पदां पदम् ॥ ४८ ॥
[75]कूटैर्नीडैस्तोरणैर्मध्यभद्रैर्युक्तायुक्तं तत्तु[76] सर्वाङ्गशोभम्[77] ।
नानाधिष्ठानाङ्घ्रिवेद्यादियोगं धाम[78] प्रोक्तं तैतिलानां मयेह ॥ ४९ ॥

इति मयमते वस्तुशास्त्रे एकभूमिविधानं नाम
एकोनविंशोऽध्यायः

68. E : वीरभद्रं तु
69. E : मुनीन्द्रके for मुनीन् न्यसेत्
70. F : omits 46b-47a.
71. E : प्रतिमारूपं for प्रतिमाश्चैव
72. E : वृतेर्
73. D : तत् स्थापनमीरितम्
74. E and F omits 48a.
75. D : कूटेक्रिडैस्
76. E : युक्तं वायुक्तं तु
77. D : शोभैः
78. E : धाम्नः

45b-46 On the third floor is the group of the Marut. On each floor there are the Amara, the Siddha, the Gandharva and the Muni; every (upper storey) must have sixteen images.[33]

47-48a At each corner of the base of the attic is (the image) of a bull; the mounts of each of the gods represented are to be placed to the right of the corresponding god.

48b-49 A shrine with all these characteristics is a guarantee of success. I have described the dwelling of gods in this chapter; it may or may not be provided with corner aediculae, with false dormer windows, with arcatures or with median foreparts; it is decorated with all essential elements and all types of base, pillar, stereobate . . . etc.[34]

Thus ends, in the *Mayamata*, treatise on dwelling,
the nineteenth chapter: RULES FOR ONE STOREYED TEMPLES.

33. That is to say that secondary deities (Amara, Siddha. . .) are to be added to the gods listed above in order that there would be sixteen images for each storey. Cf. *Īśānaśiva* Kriyā. 32.27-28a:

तले तलेऽमरान् सिद्धान् यक्षविद्याधरानपि ।
गन्धर्वानप्यप्सरसः सिद्धान् (?) नागांस्तथा मुनीन् ॥
प्रमथांश्चैव दैत्यादीन् षोडशप्रतिमास्तथा ।

34. *Nānādhiṣṭhānāṅghrivedyādiyogyam*: similar expression are often found in temple descriptions (e.g. 20.15; 21.10, 28, 38; etc.); they give to the architect a considerable latitude in the choice of elements amongst the types proposed in chapters 13 to 18.

अथ विंशोऽध्यायः

[द्विभूमिविधानम्]

द्वितलं पञ्चधा मानं वक्ष्ये संक्षेपतः क्रमात्।
[1]पञ्चषड्ढस्तमारभ्य द्विद्विहस्तविवर्धनात्॥ १॥
सैकार्कमनुहस्तान्तमुत्सेधं पूर्ववद् भवेत्।
तारे [2]सप्तर्तुभागे तु भागं सौष्ठिकविस्तृतम्॥ २॥
[3]कोष्ठं तु [4]द्विगुणायामं शेषं हारं सपञ्जरम्।
विमानोत्सेधं विभजेदष्टाविंशतिसङ्ख्यया॥ ३॥
[5]ईशदृगृतुबन्धांशैर्भूतनेत्रशिवांशकैः।
नेत्रसार्धचतुर्भागैरध्यर्धेन यथाक्रमम्॥ ४॥
मसूरकाङ्घ्रिकं मञ्चाङ्घ्रिमञ्चवितर्दिकम्[6]।
कन्धरं शिखरं कुम्भं मूलतः परिकल्पयेत्[7]॥ ५॥

[स्वस्तिकम्]

1. A, B, C, F : पञ्चषट्सप्तमारम्भ; E : पञ्चषट्पञ्चमारभ्य
2. D : सप्तषड्भागे; E : सप्तमाभागे
3. E :. कोष्ठक-
4. D : द्विगुणांशं
5. A, B, E : ईशाद् दृगृतु; C, A (var) : ईशादृतु
6. E : हतादिकम्
7. D : कुमुदं परिकल्पयेत्; E : मूलाद् परिवर्जयेत्

CHAPTER 20

TWO STOREYED TEMPLES[1]

1-2a Now, in brief, I present the five possible sizes for two storeyed temples: their width is from five or six cubits to thirteen or fourteen by successive increments of two cubits; their height is calculated as above.[2]

2b-3a The width (of the ground floor) is divided into six or seven equal parts; there is one for the width (of each) of the corner aediculae, two or three for the length of the median aediculae and the rest are for the dwarf-galleries (which join them) and in which are comprised the intermediate aediculae.[3]

3b-5 The height[4] of the temple is divided into twenty-eight parts: three[5] for the base, six for the ground floor, three for its entablature, five for the storey and two for its entablature, one for the stereobate (of the attic)[6] and two for the attic (itself), four and a half for the roof and one and a half for the finial;[7] such must be the disposition from the bottom upwards.

1. See *Mānasāra* (chapter 20) and *Śilparatna* (37.13-17). That chapter deals also with arcatures (*toraṇa*).
2. Cf. 19.2-3.
3. Proportions of multi-storeyed buildings are given in relation to their height (see next note) and to their width. For each storey are given the relative dimensions of the aediculae placed upon its entablature (thus surrounding the level of the pillars of the storey located just above). *Sauṣṭhika* (= *kūṭa*), *koṣṭha*, *hāra*, *pañjara*: see above chapter 19 note 28.
4. Elevation of multi-storeyed temples comprises all the six levels and such temples are often said to be *ṣaḍvarga* (or *ṣaḍaṅga*); however there are as much level of pillars and entablature as there are storeys (cf. chapter 14 note 9 and Dagens 1984 pp. 49-50); as usual the 'level of pillars' is designed by terms whose meaning is 'pillar' (*stambha*...).
5. *Īśadṛg*: 'the (three) eyes of Īśa-Śiva'.
6. *Vitardi*: cf. chapter 14 note 10 and 18.2.
7. *Kumbha*: see chapter 18 note 31.

[स्वस्तिकम्]

चतुरश्रमधिष्ठानं तद्वत् कन्धरमस्तकम् ।
चतुष्कूटसमायुक्तं चतुष्कोष्ठसमन्वितम् ॥ ६ ॥
[8]दभ्रनीडानुपर्यष्टौ षडष्टैवाल्पनासिकम् ।
शिखरं [9]चोरुनीडाभिर्वेदसङ्ख्याभिरन्वितम् ॥ ७ ॥
हारान्तरस्य मध्ये तु कड्यं कुम्भलतान्वितम् ।
तोरणैर्वेदिकाद्यैस्तु [10]नानाचित्रैर्विचित्रितम् ॥ ८ ॥
[11]सर्वदेवार्हकं शस्तं नाम्नैतत् स्वस्तिकं भवेत् ।

[विपुलसुन्दरम्]

तदेव सौष्ठिकं निम्नमुन्नतं कोष्ठकं यदि ॥ ९ ॥
अन्तरप्रस्तरोपेतमेतद् विपुलसुन्दरम् ।

[कूटलक्षणम्]

अंशमंशत्रयं [12]सत्रिपादांशं साङ्घ्रिभागिकम् ॥ १० ॥
भागत्रयं [13]वितर्द्यङ्घ्रिप्रस्तरग्रीवमस्तकम् ।
पादोदये दशांशे तु [14]द्वितलादिविमानके ॥ ११ ॥
[15]अन्तरप्रस्तरोपेतं कूटशालोन्नतं मतम्[16] ।

[कैलासादि]

तदेव कोष्ठकं निम्नं सौष्ठिकं चोन्नतं यदि ॥ १२ ॥

8. A (var), C : दभ्रनीडाम्; D : भद्रनीडान्; F : अग्रनीडाम्
9. D : चोरुनासाभिर्; E : चरुनाडीभिर्
10. E : नवचित्र-
11. D : सर्वदेवाग्रकम्
12. D : चापि त्रिपादांशं
13. E : वितस्त्या-
14. E : विमलादि
15. F : अन्तरे
16. E : भवेत्

Svastika temple (Fig. 15)

6-7 The base is square and so are the attic and the roof; there are four corner aediculae and four more (in the middle of the facades); above are eight small size false dormer windows and forty-eight others which are very small; there are four large niches in the roof.

8-9a On the wall, in the middle of the recesses are creepers coming up out of vases.[8] A temple like this, provided with arcatures, socle (etc.) in various forms, is suitable for all the gods and is called *svastika*.

Vipulasundara temple

9b-10a However, if corner aediculae are lower than median ones and if there is a socle (beneath the latter)[9] this is a *vipulasundara*.

Aediculae

10b-12a For temples with two storeys or more, the height of the stereobate which supports the aediculae is a tenth that of the pillars (of the corresponding storey): the height of the body (of these aediculae) is three tenths, that of their entablature one and three quarter tenths, that of their attic one and a quarter tenths and that of their roof three tenths. The corner and median aediculae (may be) elevated by a socle.

Kailāsa and other temples

12b-13a If median aediculae are lower than corner ones however and if there is a socle (beneath these latter) this is said to be a *kailāsa*.

13b-16a Or, if the stereobate of attic, the attic, roof and finial are all circular, if there are eight corner aediculae and four median ones,[10] if there are

8. *Kumbhalatā*: that decorative feature is made up of a vase of plenty from which come up a lotus stem; a confused description is given below 21.80b-81; cf. *Īśānaśiva* Kriyā. 32.19.20, *Śilparatna* charpter 28 and F.D.K. Bosch, *The Golden Germ*, 1960, p. 110 sq.
9. *Antaraprastara* (also *vedikā* 21.67 or *madhyamamañca* 22.53): cf. chapter 14 note 10; that stereobate may be placed above the entablature (and below aediculae and dwarf-galleries) all around the building or only above certain parts of the entablature (thus heightening the aediculae which are placed upon those parts).
10. The four elongated aediculae (*śālā*) are placed upon the entablature of the first storey. The plan being circular above the second (and last storey), it is not possible to put elongated aediculae above the centre of the entablature of that second storey, but only square aediculae at the corners.

अन्तरप्रस्तरोपेतमेतत् कैलासमुच्यते[17] ।
तदेव वर्तुलं वेदिकन्धरं शिखरं घटम् ॥ १३ ॥
[18]अष्टकूटं चतुश्शालोपेतं सप्ताष्टनासिकम् ।
कोष्ठकान्निर्गमं मध्ये द्वित्रिदण्डेन सौष्ठिकात्[19] ॥ १४ ॥
[20]समग्रीवाशिरोयुक्तं कूटकोष्ठकमीरितम् ।
[21]नानाधिष्ठानसंयुक्तं नानापादैरलङ्कृतम् ॥ १५ ॥
नाम्नैतत् पर्वतं प्रोक्तं विमानं सार्वदेशिकम् ।
तदेव शिखरे चार्धकोष्ठकं तु चतुष्टयम् ॥ १६ ॥
चतुरश्रशिरोयुक्तं चतुष्कूटसमन्वितम् ।
नानाधिष्ठानसंयुक्तं षडष्टैवाल्पनासिकम् ॥ १७ ॥
नाम्नैतत् स्वस्तिबन्धं स्यान्नानावयवशोभितम् ।
[22]तदेव सौष्ठिकं कोष्ठमन्तरप्रस्तरैर्युतम् ॥ १८ ॥
[23]हाराल्पपञ्जरं निम्नं[24] नवाष्टैर्वाल्पनासिकम्[25] ।
नानालङ्कारसंयुक्तं कल्याणमिति पठ्यते[26] ॥ १९ ॥
तदेव [27]शिखरे चार्धकोष्ठकं रहितं तु चेत् ।
[28]चतुर्नीडासमायुक्तमेतत् पाञ्चालमिष्यते ॥ २० ॥
तदेवाष्टाश्रकं वेदीकन्धरं शिखरं घटम् ।
शिखरेऽष्टमहानासि[29] नाम्नैतद् विष्णुकान्तकम् ॥ २१ ॥
तदेव कूटशालानामन्तरप्रस्तरं[30] विना ।
तच्चतुर्भागमाधिक्यमायतं चतुरश्रकम् ॥ २२ ॥

17. D : विपुलसुन्दरम् instead of कैलासमुच्यते
18. F : अष्टकोणं
19. E : सौष्टिकम्
20. D : समग्रीवशिरोयुक्तं
21. E : omits 15b-17a.
22. E : तदग्रे
23. C : हाराल्पमञ्जरं; D : हाराष्टपञ्जरं
24. E : नाम्रा
25. C : नवाष्टैवाल्पनासिकम्
26. E : इष्यते instead of इति पठ्यते
27. D : शिखरोच्चा-
28. D, E, F : चर्तुनासि
29. C : नाडी
30. E : प्रस्तरैर्

fifty-six false dormer windows, if the projection of the median aediculae is of two or three modules in relation to the corner aediculae, if the attic and the roof are the same height (as above); if there are both corner and median aediculae, the temple is called *parvata* and is suitable in all cases: a base and pillars of any types may be used.

16b-18a Again, if there are four half aediculae, of elongated type,[11] set into the roof which is square plan, if there are four corner aediculae and forty-eight small false dormer windows, if there is a base of whatsoever type desired, this is said to be *svastibandhana* for which all types of elements are suitable.

18b-19 Or again, if corner and median aediculae are on socles and if (consequently) dwarf-galleries and intermediate aediculae are much lower, if there are sixty-two small false dormer windows, this is a *kalyāṇa* for which all types of decoration are suitable.

20 Or, if there are no aediculae set into the roof but there are four false dormer windows, this is said to be *pāñcāla*.

21 If the stereobate of attic, the attic, roof and finial are octagonal and if there are eight false dormer windows on the roof, this is said to be *viṣṇukānta*.

22-23 If there are no socles under the corner or median aediculae, if the plan is rectangular with a length a quarter more (than its width), if

11. *Ardhakoṣṭha*: the gable frontage of those half-*koṣṭha* makes up a kind of miniature protruding porch (see also below v. 35).

12. One may think of the main shrine or Śrīraṅganāthasvāmi temple at Srirangam.

आयताश्रं तथा वेदीकन्धरं शिखरं भवेत् ।
स्थूपित्रयसमायुक्तमेतन्नाम्ना सुमङ्गलम् ॥ २३ ॥
तदेवायतवृत्तं चेद् वेदिकाकन्धरं शिरः ।
सर्वावयवसंयुक्तमेतद् गान्धारमिष्यते ॥ २४ ॥
तारादर्धांशमाधिक्यमायतं चतुरश्रकम् ।
द्व्यश्रवृत्तशिरोयुक्तं नेत्रशालामुखान्वितम्[31] ॥ २५ ॥
[32]हस्तिपृष्ठामिदं द्व्यश्रं वृत्तं वापि मसूरकम् ।
चतुरश्रमधिष्ठानं वृत्तं स्याद् गर्भगेहकम् ॥ २६ ॥
सर्वालङ्कारसंयुक्तमेतन्नाम्ना मनोहरम् ।
तदेव जन्माद्या कुम्भाद् वृत्तं चेति बहिर्बहिः ॥ २७ ॥
शेषं पूर्ववदुद्दिष्टमिष्टमीश्वरकान्तकम् ।
तदेव चतुरश्रं स्याद् गर्भगेहं मसूरकम् ॥ २८ ॥
वर्तुलं जन्मतः स्थूपिकान्तं चेद् वृत्तहर्म्यकम् ।
आयताश्रमधिष्ठानं षडश्रं कन्धरं शिरः ॥ २९ ॥
तदेव पूर्ववत् सर्वं नाम्ना [33]कुबेरकान्तकम् ।
मानं पञ्चविधं [34]धाम्नां भेदं पञ्चदशैव हि ॥ ३० ॥
द्वितलानां यथा प्रोक्तं तथा कुर्याद् विचक्षणः ।

[पुनः धामभेदाः]

सञ्चितासञ्चितं चैवोपसञ्चितमिति त्रिधा ॥ ३१ ॥
स्त्रीपुंनपुंसकं चैव त्रिविधं तत् प्रवक्ष्यते ।
[35]इष्टकाभिः शिलाभिर्वा सञ्चितं यद् घनीकृतम् ॥ ३२ ॥

31. E : समन्वितम् for मुखान्वितम्
32. E : सन्ति
33. F : कौबेर
34. C, E : नाम्ना
35. E : इष्टकादि

stereobate, attic and roof are rectangular and if there is a triple finial,[12] this is said to be *sumaṅgala*.

24 If stereobate, attic and roof are elliptical and if all the elements prescribed above are present, this is a *gāndhāra*.

25-26 Or, if the plan is rectangular with a length a quarter more than its width, if the roof comprises an apse, if there are two elongated aediculae on the facade,[13] this is said to be *hastipṛṣṭha* type; its base may equally be apsidal.

27a (Or again), if the plan of the base is square whilst that of the sanctum is circular and if the elements prescribed (above) are all present, this is a *manohara*.

27b-28a If the plan is circular from the plinth (of the base) to the finial, within and without, and if everything else is as above this is *īśvarakānta* type.

28b-29a If the sanctum is square and the base circular and if the plan is circular from base to finial, this is a *vṛttaharmya*.

29b-30a Or, if the base is rectangular, the attic and roof hexagonal and everything else as above, this is said to be a *kuberakānta*.

30b-31a There are five possible dimensions for the fifteen types of two storeyed temple which the expert is to construct as has been prescribed.

New classification of buildings

31b-34 There are three kinds (of building) called *sañcita*, *asañcita* and *upasañcita* and it is said that these are male, female and neuter.[14] The

13. *Netraśālāmukhānvita*: see below 21.24b-25 and note *ad loc.*

14. Gender classification used elsewhere for bricks (12.105-107; 15.68-69; 18.118) or trees (15.85-86; 17.60) is applied here to internal structure of buildings. *Sañcita*: 'thick, dense, piled up'; here the term is applied to building of which the top part is made up of a massive (*ghanīkṛta*) stonework or brickwork; the vaulted (*bhoga*: literally 'curved') but inaccessible (*aga*) parts of a brick or wooden *asañcita* building are the hollow spaces inside their cupola-like brick roof or inside their timber-roof; see also 24.135 and note ad loc. *Mānasāra* (19.10-11) uses *sañcita*, *asañcita* and *apasañcita* respectively to designate temples sheltering standing, seated and reclining images.

कपोतादिशिरोयुक्तं [36]तत्तत् पुंस्त्वं समीरितम्[37] ।
[38]ऐष्टकं दारुजं सौधं भोगयुक्तागसंयुतम् ॥ ३३ ॥
[39]स्त्रीत्वं ह्यसञ्चितं भोगाभोगयुक्तं द्रुमेष्टकैः ।
घनाघनाङ्गयुक् षण्डमुपसञ्चितमिष्यते ॥ ३४ ॥

[खण्डभवनम्]

ऊर्ध्वतलपादनिजदैर्घ्यमुनिभागे[40]
स्थूप्युदयमेकमथ कं[41] प्रति गुणांशम्[42] ।
द्व्यंशि गलमंशकवितर्दिकमधस्तात्
[43]खण्डभवनस्य विधिरुक्तमुरुधीभिः[44] ॥ ३५ ॥

[तोरणम्]

पादोदये दशनवाष्टविभाजिते तत्[45]
सप्तर्तुपञ्चरणायतमत्र भागम् ।
[46]शेषं झषांशमुदयार्धविशालकं वा
षट्पञ्चवेदचरणेन भवेद् विशालम् ॥ ३६ ॥

36. E : तत् for तत्तत्
37. E : समुदीरितम्
38. E : श्रेष्ठकं
39. E : स्त्रीत्वास्य for स्त्रीत्वं ह्य
40. E : दैव्यमुनिभागैः
41. E : अधिकं for अथकं
42. A (var), C : गुणांशकम्
43. D : कण्ठ-
44. E : वधिरुक्तविदधीभिः
45. E : तु
46. F : शेषजनुषांशम्

sañcita building is made out of stones or bricks; it is massive from (entablature) dripstone to roof and is said to be male. That which is of bricks or wood and which comprises inaccessible vaulted parts is *asañcita* or female. That which comprise vaulted parts in places and massive elsewhere is called neuter or *upasañcita*.

Engaged structures[15]

35 According to the ancients the proportions of the engaged structures are as follows: the height of their finial is one seventh the height of the pillars of the upper storey; the height of their roof is three sevenths (that the height of the pillars), that of their body two sevenths, and that of their base, one seventh.[16]

Arcatures[17]

36 The height of the colonnettes (of arcatures) is seven tenths, six ninths or five eights that of the pillars (of the corresponding storey); the rest (of that height) is occupied by the fish-like lintel.[18] The width of the arch is half the height (of the colonettes) or it is one sixth, one fifth or a quarter of it.

15. *Khaṇḍabhavana* (also *khaṇḍaharmya*): see 22.74-75; those structures are engaged in the main body of the temple at the level of the ground floor or of one or more of upper storeys Their position corresponds often to that of the aediculae on the entablature; hence the term *hārā* is often used to designate the recesses which separate them and, by extension, the external wall of the cella (see chapter 21 notes 24 and 29).
16. *Ka* designates the roof for that one is the 'head' (chapter 18 note 3); *gala* ('neck') which often designates the attic (ibid.) is here applied to what corresponds to the 'level of the pillars' of the engaged aedicula.
17. *Toraṇa*: those decorative features comprising two colonettes supporting an arched lintel may frame as well a door as a niche sheltering a divine image (which niche is often called '*devakoṣṭha*' in art history books); four types of *toraṇa* are described in chapter 21 (vv. 29 sq. and 69 sq.); cf. *Tantrasamuccaya* II. 35.
18. *Jhaṣāṃṣa* (21.35: *jhaṣakhaṇḍa*): that 'fish-like part' is the *toraṇa* curved lintel (cf. comment. apud *Tantrasamuccaya* II.35: jhaṣaṃ: matsyarūpam dvāroparigatāvayavam); its extremities are often *makara* shaped hence probably its name (see 21.69 sq.).

[47]नीडस्य तावदुदयं च विशालमङ्घ्रे-
[48]मूलात् त्रिपादविपुलं तलिपं तयोश्च ।
[49]हारान्तरे सदनमध्यपदे च कूटे
कोष्ठे च तोरणमलङ्कृतमेव कुर्यात् ॥ ३७ ॥

द्वारस्योभयपार्श्वे [50]द्वारसमीपे तु वाथ पदमध्ये ।
द्वारपवासगुहा[51] स्यादुत्तरमण्डान्तकं तु[52] वोच्चं[53] तत् ॥ ३८ ॥
[54]खण्डान्तपोतिकान्तं तोरणमात्रोदयं तु वा कथितम् ।
[55]युक्त्या प्रवेशयुक्त्या सर्वस्मिन् धाम्नि कर्तव्याः ॥ ३९ ॥

इति मयमते वस्तुशास्त्रे द्विभूमिविधानं नाम
विंशोऽध्यायः

47. D : नीडश्च
48. E : मूल-
49. E : भारान्तरे
50. A (var), C : सारसमीपे
51. E : गृहा
52. E : मध्ये तु instead of मण्डान्तकं तु
53. A (var), C : वोच्चं
54. D : कण्ठान्तं बोधिकान्तं; E : खण्डान्तं बोधिकान्तं
55. E : युक्त्या प्रवेशयक्तय (?) सर्वेषां धाम्नि प्रकर्तव्याः

37 The arch's height is equal to its width;[19] the diameter of the colonettes is three quarters that of the bottom of the pillars (of the corresponding storey) for both of them (?). Decorative arcatures should be placed in on dwarf-galleries, in the middle of the facade of the building, on corner aediculae and on elongated ones.

38-39 (The arcatures are) to surround the door, or to be placed beside it or in the middle of the facades. The niches for the guardians of the door are elevated up to the architrave, or else the arch which surrounds it is elevated up to the dye (with human figure) or up to the bracket capital (of the ground floor pillars);[20] they are to be disposed according to the arrangement of the entrance peculiar to each building.

Thus ends in the *Mayamata*, treatise on dwelling,
the twentieth chapter : RULES FOR TWO STOREYED TEMPLES.

19. *Nīḍa*: the term designates 'false dormer windows' (cf. chapter 19 note 18) as well as a type of aedicula (ibid., note 28); it is used here probably because the arched lintel of the *toraṇa* looks like the horseshoe arch which frames false dormer-windows as well as the gable of that type of aedicula.
20. *Khaṇḍa*: probably a variation for (*vīra-*) *kaṇda* or °*kānta* (see chapter 15 note 19); *potikā*: see ibid., note 23.

अथ एकविंशोऽध्यायः[1]

[त्रिभूमिविधानम्]

[2]त्रितलं पञ्चधामानं संक्षेपाद् वक्ष्यतेऽधुना ।
सप्ताष्टहस्तमारभ्य द्विद्विहस्तविवर्धनात् ॥ १ ॥
पञ्चदशविकारान्तं [3]व्यासं तुङ्गं तु पूर्ववत् ।

[स्वस्तिकम्]

[4]सप्ताष्टनन्दहस्ते तु सप्ताष्टांशैर्विभाजिते[5] ॥ २ ॥
भागेन कूटविस्तारं कोष्ठद्वित्रिगुणायतम् ।
लम्बपञ्जरमर्धांशं[6] हाराभागं[7] तु तत्समम् ॥ ३ ॥
[8]ऊर्ध्वभूमौ[9] षडंशेंऽशं कूटं तद्द्विगुणायतम् ।
कोष्ठकं चान्तरे हारं भागेनैव प्रकल्पयेत् ॥ ४ ॥
[10]ऊर्ध्वभूमौ[11] त्रिभागेन मध्ये भद्रं विधीयते ।
[12]दण्डं सार्धं द्विदण्डं वा भद्रं तत् कारयेद् बुधः ॥ ५ ॥
[13]विमानोच्चे[14] विशेषेण चतुर्विंशतिभाजिते[15] ।
पाशगङ्गाश्विनीभिस्तु सत्रिपादगुणांशकैः ॥ ६ ॥

1. Manuscript G starts from here.
2. G : त्रितलं पञ्चधामानं वक्ष्ये सङ्क्षेपात् क्रमात्
3. A, C, D, E, F : व्यास-
4. E : सप्ताष्टनन्दहस्तैः; G : सप्ताष्टनवहस्तं
5. E : विभाजितैः
6. E : अध्यंशं for अर्धांशं
7. C : भागाभागं
8. F : omits verse 4.
9. E : भूमेः
10. F and G omit 5a.
11. E : भूमेः
12. E : द्विदण्डं सार्धदण्डं वा; G : दण्डांशाद् द्विदण्डं वा
13. G : omits 6a.
14. A, C, D, E : विमानोच्चं
15. E : चतुर्विंशद्विभाजिते

CHAPTER 21

THREE STOREYED TEMPLES[1]

1-2a Now I briefly present three storeyed temples for which there are five series of possible dimensions; their width is from seven or eight cubits to fifteen or sixteen by successive increments of two cubits; their height (is calculated) as above.[2]

Svastika temple

2b-3 If the (width of the ground floor) is seven, eight or nine cubits it is to be divided into seven or eight parts; the width of the corner aediculae (topping its entablature) takes up one part, the length of the median ones two or three, the width of the overhanging intermediate aediculae[3] half a part and the dwarf-galleries (which join these different elements) the same.

4 The second storey must be six parts in width,[4] the width of the corner aediculae taking up one part and the length of the median aediculae twice that, dwarf-galleries being one part wide.

5 The third storey is three parts wide and comprises a median part to which the sage gives a projection of one module, one and a half or two modules.

6-8 As for the height of the temple, the sage is to divide it into twenty-four parts: three for the base, four[5] for the body (of the ground floor), two for

1. The second part of this chapter (from v.61 onwards) deals with various subjects (aediculae, arcatures, stairs, etc.). About three storeyed temples see *Mānasāra* (chapter 21) and *Śilparatna* (37.27-43).
2. See above 19.2-3.
3. *Pañjara*: see chapter 19 note 28; they are probably 'overhanging' (*lamba*) for their frontage is projecting from the dwarf-galleries.
4. That is to say that the width of the second storey is six sevenths or six eighths of that of the first storey.
5. The context makes necessary to give to *gaṅgā* the value 'four' (see also 22.56); according to Pandit N.R.Bhatt the explanation may be found in the tradition according to which they are 'four' Gaṅgā related to the four *varṇa*; Godāvarī being Dvijagaṅgā, Bhāgiratī Kṣatriya°, Narmadā Vaiśya°, and Kāverī Śūdra°.

सार्धांशैः सार्धबन्धांशैः सपादांशार्धकांशकैः[16] ।
सार्धत्रिभिस्तु भागेन योजयेत् तु विचक्षणः[17] ॥ ७ ॥
[18]धरातलमधःस्तम्भ[19]मञ्चमङ्घ्रिकमञ्चकम् ।
तलिपं प्रस्तरं वेदीकन्धरं शिखरं घटम् ॥ ८ ॥
कूटं नीडं कोष्ठकं चाष्टकं[20] तद् वेदाश्राभं जन्मतः स्थूपिकान्तम्[21] ।
[22]ऊर्ध्वे भूमावल्पनीडं द्विरष्टाविष्टं ह्यस्मिन् षण्णवत्यल्पनासम् ॥ ९ ॥
नानाधिष्ठानाङ्घ्रिवेद्यादियोगं मूर्धन्यष्टार्धं[23] तथादभ्रनासम् ।
कोष्ठं कूटादुन्नतं चेत् समं च शम्भोर्वासं स्वस्तिकं तत्त्रिभौमम्[24] ॥ १० ॥

[विमलाकृतिकम्]

[25]तारे सप्तनवांशे तु भागं सौष्ठिकविस्तृतम् ।
शालाभागं तथा द्व्यंशं हाराभागेन कल्पयेत् ॥ ११ ॥
अष्टकूटं तु तत्कोष्ठं[26] द्वादशैव विधीयते ।
अष्टौ नीडानि विंशत्तु [27]शतमत्राल्पनासिकम् ॥ १२ ॥
अष्टाश्रं मस्तकं वेदी कन्धरं चाष्टनासिकम्[28] ।
विमलाकृतिकं नाम्ना शम्भोर्वासं सनातनम् ॥ १३ ॥
हस्तनवसप्तति[29]सप्तनवभागं
भागततिकूटवसुकं तु रविकोष्ठम्[30] ।
ऊर्ध्ववसुपञ्जरमथाष्टगलनासं[31]
विंशतिशतानु(?) विमलाकृति विमानम् ॥ १४ ॥

16. E : सपादांशांशकांशकैः
17. E : विचक्षणैः
18. G : तरातलम्
19. C : स्तम्भं for स्तम्भ-
20. E : omits चाष्टकं
21. C : स्तूपिकान्तम्
22. F : ऊर्ध्वे नीडाल्पनीडं
23. E : अष्टाश्रं for अष्टार्धं
24. A, B, D, G : तत्त्रिभागम् ; F : तत्त्रिभूमम्
25. F : omits verses 11 to 18.
26. E : ततः कोष्ठं for तु तत्कोष्ठं
27. All the texts give शतमात्रा-
28. E : नासिका
29. A, E, C, D, E : सप्तति instead of सप्तति
30. A, B, C : वसुकन्तुकमिवोष्ठम्
31. E : नासि

its entablature, three and three quarters for the body (of the second storey), one and a half for its entablature, three and a half for the body (of the third storey), one and a quarter for its entablature, one half for the attic and its stereobate,[6] three and a half for the roof and one for the finial.

9-10 There are eight corner aediculae, eight intermediate ones[7] and eight median aediculae; the plan is square from base to finial; on the upper storey are sixteen small niches as well as ninety-six small false dormer windows. Base, pillars, stereobate of the attic and all other elements may be of any type. On the roof are eight half (aediculae) and as much small false dormer windows;[8] the median aediculae are equal one to another and are more elevated than the corner aediculae.[9] This then is the dwelling of Śambhu; it has three storeys and is called *svastika*.

Vimalākṛti temple

11-13 When the width is divided into seven or nine parts, each corner aedicula makes up one part, the elongated aediculae one or two (in length) and the dwarf-galleries one. There are eight corner aediculae, twelve elongated aediculae,[10] eight niches (on dwarf-galleries) and one hundred and twenty small false dormer windows. The roof and the attic and its stereobate are octagonal and there are eight niches (on the roof). This building, ever fitting as dwelling for Śambhu, is called *vimalākṛti*.

14 When[11] the width is seven or nine cubits it is to be divided into seven or nine parts; the width of the corner aediculae makes up one part and there are eight of these; there are twelve median aediculae, eight upper(?) niches and, on the attic, eight false dormer windows; there are one hundred and twenty small (false dormer windows).[12] This is a *vimalākṛti* building.

6. Attic and stereobate seem to be of a very small height.
7. *Nīḍa*: see chapter 20 note 28.
8. *Mūrdhany aṣṭārdhaṃ tathādabhranāsam: ardha* appears to be a shortening for *ardhakoṣṭha* (see 20.16b); the dormer windows are probably between those half-aediculae.
9. There must be a stereobate below the elongated aediculae (cf. 20.10).
10. That seems to indicate that there are two elongated aediculae on each face of the first storey.
11. Verse 14 (*induvadanā* metre) gives a second description of *vimalākṛti* temple.
12. *Viṃśatiśatānu* in place of *viṃśatiśatānunāsī* ?

[हस्तिपृष्ठम्]

एकादशकरं व्यासमष्टभागैर्विभाजयेत् ।
तच्चतुर्भागमाधिक्यमायतं वृत्तमिष्यते[32] ॥ १५ ॥
द्व्यश्रवृत्तमधिष्ठानं तद्वत् कन्धरमस्तकम् ।
[33]तद्विस्तारार्धमानेन वर्तुलं वर्तनीयकम् ॥ १६ ॥
[34]अश्रात् पार्श्वे च पृष्ठं च कुर्यादर्कद्वयांशकम् ।
कूटकोष्ठकनीडानां[35] विस्तारं भागमिष्यते ॥ १७ ॥
[36]कोष्ठकं द्विगुणायामं हारा भागेन योजिता[37] ।

[मुखमण्डपम्]

समं त्रिपादमर्धं वा मुखमण्डपमिष्यते ॥ १८ ॥
[38]मण्डपोर्ध्वं यथा हर्म्यं तथालङ्कारमीरितम् ।
कूटकोष्ठादिसंयुक्तं मण्डपं सर्वहर्म्यके[39] ॥ १९ ॥
त्रिवर्गसहितं वाऽपि तोरणाद्यैर्विचित्रितम् ।
मण्डपं [40]समसूत्रं चेदन्तरालं तु[41] निम्नकम् ॥ २० ॥
[42]कूटकोष्ठादि सर्वाङ्गं मानसूत्राद् बहिर्गतम् ।
[43]स्वव्यासार्धं तदर्धार्धं दण्डं सार्धद्विदण्डकम् ॥ २१ ॥
द्विदण्डार्धं त्रिदण्डं[44] वा मानसूत्राद् बहिर्गतम् ।
एवं युञ्जीत हर्म्यं तु सम्पदामास्पदं सदा ॥ २२ ॥

32. E, G : चतुरश्रकम्
33. E : तत्तद्विस्तारमानेन
34. D : अग्रात् पार्श्वे च वृत्ते च कुर्यात् ततद् द्वयांशकम्
35. D : कर्णानां for नाडीनां
36. G : omits 18a.
37. E : योजयेत्
38. G : omits 19a.
39. A, B, C : खण्डहर्म्यके; D : खण्ठहर्य्यके
40. G : सममूत्रं
41. G : अन्तरालस्य instead of अन्तरालं तु
42. E : कूठकोष्ठादि संयुक्तं मानसूत्रबहिः स्थितम्
43. D : स्वव्यासदैर्घ्यार्धं तदंशार्धंद्विदण्डकम्
44. G : द्विदण्डं

Hastipṛṣṭha temple

15-18a (For an apsidal building) which is eleven cubits wide it is prescribed that the length be greater than the width by four eighths of that width. The base is to be rounded at one extremity as are the attic and the roof; this rounded part is to be drawn with (a radius equal to) half the width of the building. Starting from the front, the two sides and the back are to be divided into twice times twelve parts;[13] the width of the square aediculae, that of the elongated ones and that of the intermediate ones make up one part; the length of the elongated aediculae makes up two and the width of the dwarf-galleries one.[14]

The pavilion in front of the shrine[15]

18b The pavilion that comes before the shrine is of the same width as the shrine or (its width) is three quarters or half that.

19-20 The upper part of the pavilion is decorated in the same way as that of the shrine; in all temples the pavilion is to have corner aediculae, elongated aediculae, etc. Otherwise it may comprise (only) three levels of elevation[16] and is, in that case, decorated with arcatures, etc. The pavilion is on the same plan (as the shrine)[17] but if there is a covered passage this is on a lower level.

21-23a All elements such as the corner and elongated aediculae project in relation to the reference line (of the corresponding storey)[18] which projection is equal to half or a quarter their width or it is one module, one module and a half, two modules and a half or three modules, this being the projection in relation to the reference line. A building

13. That is to say that the sum of the lengths of both straight sides and of the perimeter of the apsidal back is to be divided in twenty-four parts.
14. The description of *mukhamaṇḍapa* breaks that of the apsidal temple, which is resumed with v.23b.
15. See 19.4 sq.
16. *Trivargasahita*: see 25.25; the meaning seems to be that in the second case there are no aediculae on the top of the entablature of the pavilion and that decoration is then limited to *toraṇa* and similar elements applied against the walls of the level of pillars.
17. *Samasūtram*: literaly on the same line'.
18. *Mānasūtra*: literally 'measuring line'; that *mānasūtra* is not that of the building taken as a whole (as told about in 6.19, see note *ad loc.*) but that of the storey in front of which are the aediculae; similar prescriptions are given also in chapter 22 (vv. 79b-81).

ऋजुसूत्रं प्रमाणान्तं [45]तद्भङ्गं विपदां[46] पदम् ।

[पुनः हस्तिपृष्ठम्]

[47]षड्भागं स्यात् तदूर्ध्वे तु पृष्ठतस्तस्य पार्श्वयोः ॥ २३ ॥
कृत्वार्कद्विगुणांशं तु कूटकोष्ठादि पूर्ववत् ।
[48]ऊर्ध्वभौमं चतुर्भागं[49] यथायुक्तिवशान्नयेत् ॥ २४ ॥
[50]मस्तके पुरतो नेत्रशालावक्त्रसमन्वितम् ।
[51]गर्भकूटोपसम्पन्नं क्षुद्रनास्यङ्घ्रिसंयुतम् ॥ २५ ॥
कूटकोष्ठादिसंयुक्तं यथालङ्कारमाचरेत् ।
[52]शिखरे दश[53] नास्यः[54] स्युस्तिस्रः पादसमन्विताः ॥ २६ ॥
अष्टकूटं तथा कोष्ठं नीडं द्वादश चैव हि ।
हारायां क्षुद्रनीडं स्यादर्कद्वि[55]गुणसंख्यया ॥ २७ ॥
नानामसूरकस्तम्भवेदिकाद्यैरलङ्कृतम् ।
सोपपीठमधिष्ठानं केवलं वा मसूरकम् ॥ २८ ॥
हस्तिपृष्ठमिदं नाम्ना सर्वदेवेषु[56] योग्यकम् ।

[स्तम्भतोरणम्]

पादोच्चत्रिद्विभागोच्चं पादं सर्वाङ्गसंयुतम् ॥ २९ ॥
पोतिकारहितं वीरकाण्डोपरि समण्डितम्[57] ।
उत्तरं वाजनं साब्जक्षेपणं निम्नवाजनम्[58] ॥ ३० ॥

45. E : तद्भागं
46. D : सपदां
47. E : तदभागं
48. D :- omits 24b-25a.
49. E, F : ऊर्ध्वभूमं चतुर्भूमं; G : ऊर्ध्वे भूमं चतुर्भूमं
50. F : omits 25-32.
51. D : गर्भकूटोपपन्नञ्च; E : गर्भकूटसंयुक्तं
52. E : शिखरे दभ्रनास्यस्तु द्विपादसमन्विता
53. D : शिखरोदय
54. C : नीड्यः
55. E : अर्धद्वि- for अर्कद्वि-
56. E : सर्वहर्म्येषु
57. E, G : समन्वितम्
58. C : निम्नवाजिनम्; D : भिन्नवाजनम्

organized according to this principle invariably guarantees success. A straight line should indicate the extremity (of the projecting elements) for, if this line is broken, that is a source of misfortune.[19]

Hastipṛṣṭha temple (contd.)

23b-24a Above, the width (of the second storey) is six (eighths that of the ground floor). By dividing the two sides, starting at the rear, into twice twelve parts, the same proportions as above are set for the square aediculae, those which are elongated, etc.

24b-25 The width of the last storey is four (eighths that of the ground floor) and the different elements are to be placed according to the demands of the specific case. On the gable of the roof (on the front of the building) are two (elements) shaped like wagon-roof gables and, above them, a *garbhakūṭa* surrounded by small protruding pillars.[20]

26-29a Square and elongated aediculae are arranged so as to give a pleasant effect; on the roof there are thirty false dormer windows, each held up by colonettes. There are eight square aediculae and as many elongated ones: there are twelve intermediate aediculae and, on dwarf-galleries, twenty-four small false dormer windows. All types of base, pillar, stereobate of attic (etc.) are suitable for the decoration (of such a temple); its base may or may not have a socle.[21] This is said to be *hastipṛṣṭha* and is fitting for all gods.

19. The meaning seems to be that all aediculae corresponding to a certain storey must project equally.
20. See also 20.25-26; *garbhakūṭa* seems to designate a kind of lantern placed on the top of a building (above the *garbha-gṛha*) and shaped like an aedicula (*kūṭa*). The complex decorative composition described here may be compared to what is seen on the front facade of Vīraṭṭāneśvara Temple (a temple of apsidal plan) at Kanchipuram (see the J.Dumarçay's drawing of that facade in J. Dumarçay and F.L.'Hernault, *Temple Pallava construits*, Paris 1975 (plate xliii).
21. *Sopapīṭham adhiṣṭhānam*: see 13.1-3.

तदूर्ध्वे झषकाण्डं स्यान्नानापत्रैर्विचित्रितम् ।
तोरणाकृतिसंयुक्तं मृणाल्यन्वितकन्धरम् ॥ ३१ ॥
सर्वालङ्कारसंयुक्तं स्तम्भतोरणमीरितम् ।
पादान्तरे वा हारायां कर्णप्रासादमध्यमे ॥ ३२ ॥
[59]शालामध्येऽन्तराले तु कुर्यात् सर्वेषु धामसु ।
स्तम्भे सर्वाङ्गयुक्ते [60]समतलमुभयोः पार्श्वयोर्वीरकाण्ड-[61]
स्याग्रे न्यस्तोत्तरं वाजनमुपरि दलं क्षेपणं तोरणाग्रम् ।
[62]नक्रैः [63]पत्रादिभिर्यद् विरचितमथ तद् धाम्नि वा मण्डपे [64]वा
शालायामन्यवस्तुष्वभिमतमयुतस्तम्भयुक् तोरणं स्यात्[65] ॥ ३३ ॥

[पुनः हस्तिपृष्ठम्]

तदेव चतुरश्राभमायतं तन्मसूरकम्[66] ॥ ३४ ॥
विस्तारमष्टभागं स्यादायामं दशभागभाक्[67] ।
कूटकोष्ठकनीडं च भागेन परिकल्पयेत्[68] ॥ ३५ ॥
हाराभागं तु भागेन षडंशं चोर्ध्वभूमिके ।
तदूर्ध्वे तु चतुर्भागमायामे द्व्यंशमाधिकम्[69] ॥ ३६ ॥
सायतं द्व्यश्रवृत्तं स्याद् वेदिकागलमस्तकम् ।
कूटकोष्ठादि सर्वाङ्गं पूर्ववत् परिकल्पयेत् ॥ ३७ ॥
नानाधिष्ठानसंयुक्तं [70]नानापादैरलङ्कृतम् ।
पादोपरि भवेन्नासी [71]स्वस्तिबन्धनशोभिता ॥ ३८ ॥

59. G : शालामध्येऽन्तराले वा कुर्यात् सप्तधमेषु
60. D : स्वान्तरालम्
61. E : स्थिरकाण्ड-
62. D : नखैः
63. E : पात्रा-
64. D : (instead of वा शाला- . . .) मालशाला-धमन्यस्तुशोभितम्
65. G : तोरणाग्रम्
66. E : चतुरश्रकम्
67. E : युक्
68. A : भोगोपरि कल्पयेत; A (var) : भागेनोपरि कल्पयेत; C : भागोनं परिकल्पयेत्
69. E : आसिकम्
70. D : नानाभेदैर
71. C : नाडी

Stambhatoraṇa[22]

29b-32 The pilaster (of the *stambhatoraṇa*), two thirds as high as the pillars (of the corresponding storey), is provided with all the necessary elements; it has no bracket-capital but comprises an abacus which surmounts the dye with a human figure. Above is an architrave and its upper fascia and then a band with lotuses, a groove and a fillet; above that is a fish-like arched piece, decorated with foliage and, in its inner part,[23] ornamented with lotus stems. Provided with all these elements (such a motif) is called *stambhatoraṇa*; in all types of building it is to be placed between the pillars, on recesses, on the middle of the corner and median projections[24] and on the covered passage.

33 On a pillar[25] provided with all (prescribed) elements is to be placed, above the historiated dye and at the same height on both sides, an architrave crowned by an upper fascia, a lotiform cornice and an arcature, which last is decorated with *makara*, flowers or some other motif; this arcature, which surmounts an isolated pillar, is to be placed either on a temple, on a pavilion, on a house or on any other construction.

Hastipṛṣṭha temple (cont.)[26]

34-36a Or else, when the base is rectangular the width makes up eight parts and the length ten. The square and elongated aediculae as well as the intermediate ones are one part wide, as are the dwarf-galleries.

36b-39 The second storey is six parts wide and the third four parts and their length is two parts more than their width. Stereobate, attic and roof are

22. *Stambhatoraṇa*: that decorative element, of which the description breaks once again that of the apsidal temple, is made up of a pillar (or more precisely a pilaster) topped by an arcature; cf. *Śilparatna* 23.29-32.
23. *Jhaṣakhaṇḍa*: see chapter 20 note 18; *mṛṇālyanvitakandhara*: *kandhara* ('neck, recessed part') seems to be applied here to the gable surrounded by the arch.
24. *Stambhatoraṇa* is an ornement of the level of pillars; we consider that in the present case *karṇaprāsāda* and *śālā* do not designate the aediculae placed above the entablature but the projections made up by engaged structures (see chapter 20 note 15) which correspond to them below in the plan of the corresponding storey; in the same way the term *hārā* is not applied to the dwarf-galleries which join aediculae but to the recesses which correspond to that galleries on the facade of the storeys.
25. This verse (*sragdharā* metre) gives a slightly different description of *stambhatoraṇa*.
26. The description of apsidal temples is resumed here with that of the second type.

यथा बलं यथा योगं[72] तथा कुर्याद् विचक्षणः ।
[73]एतदप्युदितं सौधं गजपृष्ठं पुरातनैः ॥ ३९ ॥
युग्मेऽप्येवं प्रयुञ्जीयात् सर्वहर्म्यं विचक्षणः[74] ।

[भद्रकोष्ठम्]

त्रयोदशकरव्यासं [75]नवधा विभजेत् समम् ॥ ४० ॥
गर्भगेहं त्रिभागेन गृहपिण्डिस्तु भागतः ।
[76]अन्धारमंशमंशेन [77]परितोऽन्धारिका भवेत् ॥ ४१ ॥
अंशेन सौष्ठिकं कोष्ठं विस्तारं [78]त्रिगुणायतम् ।
[79]अर्धेन नीडविस्तारं शेषं [80]हाराङ्गमिष्यते ॥ ४२ ॥
कोष्ठमध्ये त्रिदण्डेन नासी निर्गमनान्विता ।
उपर्यपि षडंशेंऽशं कूटं तद्द्विगुणायतम् ॥ ४३ ॥
कोष्ठकं [81]भागतो हारा पञ्जरैरन्विता भवेत् ।
[82]ऊर्ध्वभागं[83] त्रिभागेन [84]मध्ये दण्डेन निर्गमम् ॥ ४४ ॥

72. D, G : रोमं
73. F : omits 39b.
74. A, C, D, E, F : विचक्षणैः
75. E : तत्त्रिधा for नवधा
76. C : अर्धरम्; D : अलिन्द्रम्
77. C : पतिताधारिका भवेत्; F, G : परितः खण्डहर्म्यकम्
78. E : द्विगुणायतम्
79. F and G : omit 42b.
80. D : हारांशम्
81. G : भागया
82. D : omits 44b.
83. F : भागे
84. E : मध्य-

rectangular but have a rounded extremity; square and elongated aediculae (etc.) should be arranged in the same way as above. All types of base are suitable (for this temple) and, as well, all types of pillar may decorate it. Above the pillars are *svastibandha* false dormer windows.[27] The sage must construct this building to be solid and well adapted (to its use); the ancients call it *gajapṛṣṭha*.

40a A wise man should calculate for a temple with an even number (of cubits) whatever its type.[28]

Bhadrakoṣṭha temple

40b-43a When the width is thirteen cubits it should be divided into nine parts: the width of the sanctum takes up three, the thickness of its walls one, the width of the aisle one and that of the exterior wall one.[29] The width of the square and elongated aediculae and the length of the elongated ones is three parts; the width of the intermediate aediculae is half a part and what remains is for dwarf-galleries. In the middle of each elongated aedicula is a (porch-like) niche with a projection of three modules.[30]

43b-44a Above, the width (of the second storey) is six (ninths that of the ground floor); the square aediculae here are one part wide and the length of the others is twice as much; dwarf-galleries take up one part of the width and there are niches on them.

44b The upper storey has a width three (ninths that of the ground floor) and the central part of its facade projects by three modules.

27. *Svastibandhaśobhitā*: see below (v. 47) *svastikākāra*.
28. Descriptions given in this chapter correspond to buildings whose size is calculated with odd numbers of cubits; what is told here refers to the beginning of the chapter where odd and even dimensions are given (vv.1-2a).
29. We are given here a description of the temple plan starting from the sanctum (*garbhageha*) which is at the centre; *gṛhapiṇḍi*: that which surrounds the sanctum that is to say the internal wall which separates it from the aisle; that last is an optional feature of the plan (see below vv. 64-65) which is designated as *andhāra* or *alinda* (*alindra*). *Andhārikā* is the external wall which surrounds the aisle; it is often designated as *khaṇḍaharmya*, for those engaged structures (see chapter 20 note 15) cover a big part of its facades, as well as *hārā*, for those 'recesses' (above note 24) between projecting engaged structures are the only places where that wall may be seen. . .
30. The presence of that projecting element explains the name of that type of temple (*bhadrakoṣṭha*: 'with elongated aediculae endowed with projection'; see above v. 43 and 22.15-24).

चतुरश्रमधिष्ठानं वस्वश्रं गलमस्तकम् ।
आदौ तले [85]चतुष्कर्णे कूटं वेदाश्रमस्तकम् ॥ ४५ ॥
[86]अष्टाश्रमूर्ध्वभूमौ[87] तु सौष्ठिकानां तु मस्तकम् ।
[88]अष्टकूटं तथा नीडं [89]कोष्ठकं तु तथैव हि ॥ ४६ ॥
क्षुद्रनीडं तथाप्यष्टावष्टौ स्युर्गलनासिकाः ।
[90]स्वस्तिकाकारसंयुक्तं नासिकाभूषणं भवेत् ॥ ४७ ॥
भद्रकोष्ठमिदं नाम्ना यथार्थं परिकीर्तितम् ।

[वृत्तकूटम्]

[91]तदेव वर्तुलं कर्णकूटमूर्ध्वोर्ध्वभूमिके ॥ ४८ ॥
[92]मस्तकं तस्य वृत्तं स्याच्चतुर्नासीसमन्वितम् ।
वृत्तकूटमिदं नाम्ना देवानां सार्वदेशिकम्[93] ॥ ४९ ॥

[सुमङ्गलम्]

तदेवाष्टांशमाधिक्यमायतं चतुरश्रकम् ।
कर्णकूटं युगाश्रं स्यादायतं वृत्तमस्तकम् ॥ ५० ॥
कोष्ठभद्रं विना[94] तत्र शेषं पूर्ववदाचरेत् ।
स्थूपित्रयसमायुक्तमेतन्नाम्ना सुमङ्गलम् ॥ ५१ ॥

[गान्धारम्]

पञ्चादशकरव्यासं पङ्क्त्यंशेन विभाजयेत् ।
गर्भगेहं चतुर्भागमन्धार्यंशेन[95] योजिता ॥ ५२ ॥

85. A et B : चतुष्कण्ठे
86. G : omits 46a.
87. E : भूमं
88. F : कूटकोष्ठं
89. D : कोष्ठकान्तं
90. E : omits 47b.
91. G : तदेव वर्तुलं भूमिं कर्णकूटमिदं नाम्ना
92. G : omits verse 49.
93. D : देवान् सर्वविदेशिकम्
94. F : विमाना for विना
95. D : चतुर्भागं मध्यमांशेन

45-48a The base (of this building) is square, its attic and roof octagonal. The aediculae at the four corners of the first floor have a square roof, the roof of those of the second storey being octagonal. There are eight of these aediculae and as many intermediate aediculae, elongated aediculae and small niches;[31] on the attic are sixty-four *svastika* false dormer windows. This type of building is called *bhadrakoṣṭha*

Vṛttakūṭa temple

48b-49 However, if there are circular aediculae at corners of each of storey and if the roof (of the temple), also circular, is broken by four false dormer windows (this temple) is said to be *vṛttakūṭa* which is suitable for gods under any circumstances.[32]

Sumaṅgala temple

50-51 Again, if the temple is rectangular, its length an eighth more than (its width), if the oblong corner aediculae have an elliptical roof, if there are neither median aediculae nor projecting parts and if (everything else) is as above, this is called *sumaṅgala* and is to be endowed with a triple finial.[33]

Gāndhāra temple

52-54a When the width is fifteen cubits it is divided into fifteen parts, the sanctum taking up four parts of the width, the thickness of the wall (around it) one, the aisle one and the (wall with) engaged structures

31. The small niches (*kṣudranīḍa*) are those of the second storey which are smaller than those of the first.
32. *Vṛttakūṭa*: literally 'with circular aediculae'.
33. The arrangement is the same as for the two storeyed *sumaṅgala* temple described in the preceding chapter (20.22-23).

[96]अलिन्द्रमंशमंशेन खण्डहर्म्यं बहिः क्रमात् ।
[97]कर्णे मध्येऽन्तरे कार्यं कूटं कोष्ठं च पञ्जरम् ॥ ५३ ॥
भागेन कोष्ठकायामं द्विगुणं सम्मतं बुधैः ।
ऊर्ध्वभूमौ रसांशे तु भागं सौष्ठिकविस्तृतम् ॥ ५४ ॥
कोष्ठकं द्विगुणायामं हारा भागेन योजयेत्[98] ।
तदूर्ध्वे तु चतुर्भागं द्विभागं मध्यनिर्गमम्[99] ॥ ५५ ॥
दण्डं [100]वाऽध्यर्धदण्डं वा द्विदण्डं वा विशेषतः ।
चतुरश्रमधिष्ठानं तद्वत् कन्धरमस्तकम् ॥ ५६ ॥
[101]अष्टकूटं तथा नीडं कोष्ठकं तु तथैव च[102] ।
लम्बनीडमुपर्यष्टौ [103]वर्षस्थलसमन्वितम् ॥ ५७ ॥
नासिका स्वस्तिकाकारा सर्वत्र परिशोभिता ।
नानामसूरकस्तम्भवेदीजालकतोरणम् ॥ ५८ ॥
उन्नतौ कूटकोष्ठौ चेदन्तरप्रस्तरान्वितौ ।
एतद् गान्धारमित्युक्तमष्टाश्रं वा गलं शिरः ॥ ५९ ॥

[श्रीभोगम्]

तदेव [104]वर्तुलं वेदी कन्धरं शिखरं भवेत्[105] ।
शेषं पूर्ववदुद्दिष्टं नाम्ना श्रीभोगमिष्यते ॥ ६० ॥

[कूटकोष्ठादि]

वृत्ते वृत्तायते द्व्यश्रवृत्तेऽष्टाश्रे षडश्रके[106] ।
कूटकोष्ठकनीडानामुपर्युपरि च क्रमात् ॥ ६१ ॥

96. G : अलिद्रमंशमंशेन परितः खण्डहर्म्यकम्
97. D : कण्ठे
98. G : कल्पयेत्
99. D : मध्यमे निगमद्वयम् ; F, G : द्विभागं मध्यभद्रकम्
100. E : वा सार्ध-
101. F : अर्धकूटं
102. G : हि
103. F : वर्म-
104. G : कूटलं
105. G : घटम्
106. E : षडष्टके

arranged all around,[34] one. There are corner and median aediculae with intermediate ones between them; all these elements are one part wide but the median aediculae are two parts long. This is what the sages prescribe.

54b-55a On the second storey whose width is six (tenths that of the ground floor) there are corner aediculae with a width of one part; median aediculae, two parts long, are arranged here too, as well as the intermediate one which make up one part of the width.

55b-59 The (width of the) last storey is four (tenths that of the ground floor); the central element (of its facades) is two parts wide and projects by one module, one module and a half or two modules. The base is square as are the attic and the roof. There are eight corner aediculae, as many elongated and intermediate ones; higher up there are eight projecting niches and a gutter.[35] *Svastika* false dormer windows[36] are all around. Every type of base, pillar, stereobate, window and arcature are suitable (for such an edifice). If its corner and median aediculae are elevated they have a stereobate (at their base). (Such a temple) is called *gāndhāra*; both its attic and its roof may be octagonal.

Śrībhoga temple

60 If stereobate, attic and roof are circular however, the temple, which is as above in other respects, is called *śrībhoga*.

Aediculae

61-62a (The plan) being circular, elliptic, apsidal, octagonal or hexagonal, it has corner and median aediculae and niches on each storey. Square

34. Cf. above note 29.
35. *Varṣasthala*: that 'place for water' probably surrounds the upper storey (cf. 22.27-28b and note *ad loc.*).
36. They are probably placed as well on attic as on dripstones of storey entablatures.

कूटकोष्ठकनीडैश्च मण्डितं खण्डहर्म्यके[107] ।
ऋजुभागविशालात् तु द्व्यश्रवृत्ते तु वर्तुले ॥ ६२ ॥
भागं किञ्चिद् भवेन्यूनं [108]भागं सर्वं समं तु वा ।
[109]अष्टांशोन[110]दशांशोनमूर्ध्वांशं वाऽप्यधोंशकात् ॥ ६३ ॥
यथा शोभाबलावाप्तिस्तथा युञ्जीत बुद्धिमान् ।

[पुनः धामभेदाः]

[111]अर्पितानर्पितं चैव प्रासादं द्विविधं भवेत् ॥ ६४ ॥
[112]अर्पितं न च सालिन्द्रमनर्पित[113]मलिन्द्रभाक् ।
एवमल्पक्रमं सर्वं योजयेत् [114]तद् विचक्षणः ॥ ६५ ॥

[नालीगृहम्]

गुणशरमुनिनन्दैकादशैकाधिकाकै-[115]
स्तिथिमुनिदश[116]भागे हर्म्यतारे कृतेऽस्मिन् ।
शशिगुणयुग[117]बाणैः षड्यमी[118] नागनन्दैः
स्वभवनविपुलस्यार्धेन नालीगृहं स्यात् ॥ ६६ ॥

[वेदिका]

[119]हर्म्याङ्गानां कूटकोष्ठादिकानां
ग्रीवाधस्ताद् वेदिका योजनीया ।
हाराभागे वेदिकावेदिका वा
नीडं [120]वा तत्राल्पनासं[121] च कुर्यात् ॥ ६७ ॥

107. D : कण्ठहर्म्यके
108. D : साङ्गं
109. D : omits 63b-64a.
110. F : नन्द instead of दश-
111. D : अल्पितानल्पितं (See translation note *ad loc.*)
112. D : अल्पितं
113. D : अनल्पितम्
114. G : तु instead of तद्
115. C : आदिकभिस् instead of आधिकार्कैस्; D : दशार्कैस्
116. E : वसु- for दश-
117. D : मुनिवेद for गुणयुग
118. D : मुनि for यमी
119. E : हर्म्यादीनां
120. A (var), C : वात्र- for वा तत्र-
121. E : नासी

and elongated aediculae and niches should also decorate engaged structures.

62b-64a If the plan is circular or apsidal the procedure is the same as when the plan has rectilinear sides, the proportions may be rather smaller or may be exactly the same. The upper part will be smaller than the lower part by an eighth or a tenth (?). The sensible man proceeds according to the appearance, the degree of solidity and the goal sought.

New classification of buildings

64b-65 There are two sorts of temple: *arpita* and *anarpita*. An *arpita* temple has no aisle but an *anarpita* does have one.[37] It is like this that the sage arranges all (temples) even the small ones (?).

Sanctum

66 The width of the sanctum is a third, three fifths, four sevenths, five ninths, six elevenths, seven thirteenths, eight fifteenths, nine seventeenths or half that of the temple to which it belongs.

Stereobate

67 The stereobate is placed beneath the attic and beneath elements of the temple such as corner and median aediculae. This stereobate may or may not be present below the dwarf-galleries; on it (?) may be niches or small false dormer-windows.

37. Cf. 35.8-9a and note *ad loc.*

[तोरणादिविधानम्]

तोरणं त्रिविधं [122]पत्रतोरणं मकरान्वितम् ।
[123]चित्रतोरणमित्येषां [124]मण्डनं त्वधुनोच्यते ॥ ६८ ॥
बालचन्द्रनिभं [125]पत्रैश्चित्रितं पत्रतोरणम्[126] ।
द्वयोर्मकरयोर्वक्त्रस्थित[127]मध्यमपूरितम् ॥ ६९ ॥
[128]नानाविधलतायुक्तमेत[129]न्मकरतोरणम् ।
[130]तदेव पार्श्वयोर्मध्यं [131]पूरिमध्यं द्वयोस्ततः ॥ ७० ॥
नक्रतुण्डं प्रगृह्यैव द्वयोरास्यविनिर्गतैः ।
विद्याधरैश्च भूतैश्च सिंहैर्व्यालैश्च हंसकैः ॥ ७१ ॥
बालैः स्रग्दामकैरन्यैर्मणिबन्धैर्विचित्रितम् ।
चित्रतोरणमेतत् स्याद् देवानां भूभुजां वरम्[132] ॥ ७२ ॥
गुहासु प्रतिमास्तासु पार्श्वपादयुतानि च ।
तोरणान्युत्तराधस्तात् प्रयोज्यानि विचक्षणैः ॥ ७३ ॥
स्तम्भोच्चे पञ्चषट्सप्तद्व्यंशोच्चं तोरणाग्रकम्[133] ।
शेषं पादोदयं पादं चतुरश्राष्टवृत्तयुक्[134] ॥ ७४ ॥
कुम्भमण्ड्यादिसंयुक्तं [135]पोतिकारहितं तु वा ।
उत्तरं वाजनं [136]साब्जक्षेपणं क्षुद्रवाजनम्[137] ॥ ७५ ॥
पोतिकोपरि वा कुर्याद् वीरकाण्डस्य चोपरि ।
[138]उत्सन्ध्यन्तानताग्रं तु कुर्यान्मकरविष्टरम्[139] ॥ ७६ ॥

122. E : पत्रचित्रझषान्वितम्; G : प्रोक्तं तोरणं मकरान्वितम्
123. E : दामश्रात् चित्रपत्रादिमण्डनं चाधुनोच्यते
124. G : मण्डपं
125. E : पत्रैर्विचित्रं
126. G : यत्र तोरणम्
127. A, G, D, F : वक्त्रसित-; E : पत्रं सित-; G : वक्त्रात् रक्तं
128. F : नानाविधवल्लियुक्तमकरतोरणभूषितम्
129. G : प्रोक्तं instead of एतद्
130. G : तदेव पार्श्वयोर्मध्यं मणिखण्डैर्विचित्रितम्
131. D : पुरिमस्य
132. D : वरैः
133. E, G : तोरणोदयम्
134. G : चतुरश्राष्टवृत्तकम्
135. E : बोधिका-
136. C : सार्धक्षेपणं
137. G : निम्नवाजनम्
138. E : उत्सेधान्तानताग्रं
139. F : मकरपुच्छकम्

Decorative elements: arcatures, etc.

68-72 We now give the decoration for three types of arcature named: *patratoraṇa, makara(-toraṇa)* and *citratoraṇa.*[38] The *patratoraṇa* is in the shape of a crescent moon and is decorated with foliage. The arcature, in the middle of which Purin[39] stands on the snouts of two *makara,* is called *makaratoraṇa* and is decorated with liana of various kinds. *Citratoraṇa* is where Purin, placed at the centre, is flanked by two *makara* which he holds by the trunks: from their mouths pour Vidyādhara, dwarves, lions, *vyāla, haṃsa,* infants as well as garlands and festoons and cascades of jewels, ornaments for this arcature which is perfectly proper for gods and for kings.[40]

73-79 In the niches (under the arcatures) there are statues. These arcatures comprise two colonettes and the well advised arranges them beneath the architrave. The height of the (corresponding) pillars of the building being divided into five, six or seven parts, two will be for the upper part of the arcature and the rest for the colonettes; these are square or octagonal section and are provided with bell-capital, abacus, etc. They may not have bracket-capitals however. Above these, or above the dye with human figure, should be placed the lintel, its fillet, the lotiform cornice and a small fillet. The sloping part in the form of a *makara*[41] is elevated to the upper joint (of the pillars of the building). The arcature

38. See above v.29b sq. and 20.36-39; cf. *Īśānaśiva*-Kriyā. 32.1 sq. and *Śilparatna* chapter 23.
39. Purin is Śiva.
40. According to *Śilparatna* (23.14-16a) *citratoraṇa* is for vaiśya.
41. *Makaraviṣṭara*: cf. 20.36 (*jhaṣāṃśa*) and note *ad loc.*

[140]तुङ्गार्धं त्रिचतुष्पञ्चदण्डतोरणविस्तृतम् ।
द्वारतुल्योन्नतं व्यासान्तरं स्तम्भद्वयोरपि ॥ ७७ ॥
उत्तरोत्तर[141]युक्ताष्टमङ्गलोर्ध्वस्थनक्रवत् ।
[142]फलकं पञ्चवक्त्रं तु तदूर्ध्वे शूलसंयुतम् ॥ ७८ ॥
[143]छत्रकेतुपताकाश्रीभेरी कुम्भं च दीपिका ।
[144]नन्द्यावर्तेन चाष्टौ हि सर्वेषामष्टमङ्गलम् ॥ ७९ ॥
एवं प्रोक्तं चतुर्भेदं देवादीनां तु तोरणम् ।
पद्मासनोर्ध्वे कुम्भस्य तिर्यक् चारुलताकृतिः[145] ॥ ८० ॥
तदूर्ध्वे फलकोर्ध्वाब्जमिष्टकुम्भलताग्रकम् ॥ ८१ ॥
[146]पद्मकुम्भलतैवं स्यादन्यदप्येवमूह्यताम् ।
तदेवोत्सन्धिकोर्ध्वे तु [147]वीरकाण्डसमन्वितम् ॥ ८२ ॥
स्तम्भकुम्भलतैवं स्याद् स्तम्भतोरणवच्छिरः ।
हारायां तु प्रकर्तव्या दैवेऽदैवे निकेतने ॥ ८३ ॥
षडष्टदश[148]मार्ताण्डमनुवैकार[149]मात्रकैः ।
व्यासं तारार्धनिष्क्रान्तं[150] त्रिद्व्यंशं वा त्रिभागिकम् ॥ ८४ ॥
वृत्ताकारसमं [151]छन्नं [152]तोरणाङ्घ्रिवदायतम् ।
[153]सकन्धरं तदूर्ध्वे तु शुकनास्या विभूषितम् ॥ ८५ ॥

140. E : तुङ्गाग्रं
141. A (var), C, D : संयुक्त- instead of युक्त-
142. F : विकलं पञ्चवृत्तं तु
143. E, F, G : चित्र-
144. E : नन्द्यावर्तादि चाष्टभिः
145. F : चाकुलताकृतिः
146. All the texts give कुम्भकुम्भलतैवं; see translation note.
147. E : पिण्डखण्ड-
148. E : भान्वद्रि- for मार्ताण्ड-
149. G : वेकारि
150. A, D, E, F, G : निष्क्रान्त; C : निष्कान्त
151. E, G : चैव
152. G : तोरणाग्री
153. D : मञ्चगन्धरादूर्ध्वे तु शुक्रनाद्या विभूषितम्

is half as wide as high (or) its height is equal to that of the door and the width to the intercolumniation. The upper part, which surmounts the lintel and which is in *makara* form, has the eight beneficent objects upon it: on the gable is Pañcavaktra [42] and above, the trident, parasol, flag, standard, *śrīvatsa*, drum, vase, lamp and *nandyāvarta*, for these are the eight beneficent objects which bring happiness to all.[43]

80a Thus presented are the four types of arcature suitable for gods and others.[44]

80b-81 Above a lotiform base a beautiful liana inclines in relation to the vase; above, a pilaster is decorated with intermingled foliage and creepers; above, (again), a lotus which crowns the abacus forms the summit of the *kumbhalatā* (?). Such is the *padmakumbhalatā*.[45]

82-83 This may be done otherwise: above the upper joint (of the pilaster) is placed a dye ornamented with a human image; it is then a *stambha-kumbhalatā* whose upper part is like that of a *stambhatoraṇa*.[46] The motif is to be placed in the recesses of the walls of divine and human dwellings.

84-86a The *vṛttasphuṭita*[47] is as high as the colonettes of the arcature; its width is six, eight, ten, twelve or fourteen digits; its projection is half, two thirds or one third its width; the upper part is rounded and it comprises a dado ornamented with a *śukanāsī*.[48] It is the ornament of divine dwellings.

42. Pañcavaktra: Śiva.
43. For another *aṣṭamaṅgala* list, see above 12.34-35.
44. The fourth type is the *stambhatoraṇa* described above (vv. 29b-33); according to *Śilparatna*, *patratoraṇa* are for śūdra, *makaratoraṇa* for gods, brahmins and kings, and *citratoraṇa* for vaiśya.
45. See above chapter 20 note 8. The description given here is not clear. Cf. *Īśānaśiva*. Kriyā. 32.20:

    कुम्भपद्मासनयुता सैव सर्वलतान्विता ।
    पद्मकुम्भलता नाम विज्ञेया हि लता भवेत ॥

46. *Stambhatoraṇa*: cf. vv. 29b-33.
47. *Vṛttasphuṭita*: cf. *Śilparatna* chapter 27.
48. *Śukanāsī*: cf. Acharya 1946 sv.

[154]वृत्तस्फुटितमित्युक्तं द्युसदां सद्मभूषणम्[155] ।

[सोपानम्]

तले तले तु सोपानं प्रयुञ्जीत विचक्षणः ॥ ८६ ॥
[156]त्रिविधं तस्य मूलं[157] तु चतुरं वृत्तमायतम् ।
चतुर्विधप्रकारं स्यात् [158]त्रिखण्डं शङ्खमण्डलम् ॥ ८७ ॥
[159]वल्लीमण्डलमत्यर्धगोमूत्रेण समाहितम् ।
[160]मूलादग्रं[161] क्रमक्षीणं प्रथितं शङ्खमण्डलम् ॥ ८८ ॥
[162]स्याद् वल्लीमण्डलं वृक्षारोहिवल्लीसमक्रियम् ।
अश्वपादोपरि स्थित्यारोहणं दक्षिणाङ्घ्रिणा ॥ ८९ ॥
[163]द्विदण्डाद्या सप्तदण्डात् सोपानस्य विशालता[164] ।
[165]अश्वपादस्य विस्तारो द्विगुणाद्यश्चतुर्गुणात् ॥ ९० ॥
शयितव्यासपादार्धत्रिपादांशं दृशोदयैः ।
[166]स्थितानीभबालवृद्धसमखण्डान्यनुक्रमात् ॥ ९१ ॥
शयानफलकव्यासः षोडशाष्टादशाङ्गुलाः ।
[167]समुद्गतं षडंशैकमेवं सोपानकल्पनम् ॥ ९२ ॥
हस्तव्यासं द्विदण्डं तत्पादव्यासं तु बाहलम् ।
[168]हस्ते यथाबलं योज्यं [169]प्रवशे स्थितशायिनोः[170] ॥ ९३ ॥

154. F : वृत्तसपटिकम्
155. E : सद्मव्यासानाम्
156. D : त्रिविधस्य मूलं त्ववतारं वृत्तमायतम्
157. E : मूले
158. E : त्रिदण्डं; G : निशङ्खे
159. D : मल्लमण्डलमध्यर्धं गोमूत्रेण; E : वल्लीकामण्डल-मतिगोमूत्रेण; G : वल्मिकमण्डमित्युक्तमर्धगोमूत्रेण
160. G : त्रिखण्डमण्डलादग्रात् क्रमदक्षिणम्
161. A : आग्रात्; C : अग्रात्
162. G : अर्धगोमूत्रेण प्राथितं शङ्खमण्डलम्
163. F, G : द्विदण्डादि सप्तदण्डान्तं
164. A, C, D, F : विशालतः; E : विधीयताम्; G : विशालवत्
165. End of the chapter is missing in G.
166. E : स्थितानीचान्धको वृक्षसारखण्डान्यनुक्रमात्
167. F : समुद्गतिः
168. E : असमे
169. C : प्रवेश
170. D : शालिने

Stairs[49]

86b-88a The sensible man puts a stairway between two storeys. Three sections are possible for the stairwell:[50] square, circular and rectangular. There are four types of stairs: *trikhaṇḍa*, *śaṅkhamaṇḍala*, *vallīmaṇḍala* and *ardhagomūtra*.[51]

88b-90 The *śaṅkhamaṇḍala* diminishes in width from bottom to top. The *vallīmaṇḍala* is like a liana which climbs by curling round a tree. Starting from the first step[52] and going up, the newel is to the right. The width of the stairs is from two to seven modules, that of the bottom step is from two to four times that of the stairway.

91-92 The height of the steps of steep stairway is a quarter, half or three quarters their depth. But for the sake of elephants, children and the aged, their steps should be in regular succession; their depth is sixteen or eighteen digits and their height makes up the sixteenth of it. A well constructed stairway must be like this.

93-95 The width of the strings[53] is two modules and their thickness is a quarter of that, treads and risers are to be solidly fixed on them. A stairway comprises an uneven number (of steps), it may or may not be

49. *Sopāna*: cf. *Śilparatna* (22.104 sq.), *Īśānaśiva* (Kriyā. 32.75 sq.) and *Kāśyapajñānakāṇḍa* (p. 60-61).

50. *Mūla*: literally 'base, bottom'; here it designates the space occupied by the stairway on the ground that is to say the horizontal projection of the stairwell.

51. *Trikhaṇḍa* is probably a three flight staircase (or a staircase with two flights separated by a landing;) *śaṅkhamaṇḍala* is a winding staircase without central newel, while *vallīmaṇḍala* is established around such a central newel. *Ardhagomūtra* ('half a zigzag') is a dog-leg staircase (cf. *Śilparatna* 20.108b):

तद्द्विखण्डं च सोपानमर्धगोमूत्रसंज्ञकम् ।

52. *Aśvapāda* ('horse hoof'): the first step is often decorated and half moon shaped; cf. *Īśānaśiva*. Kriyā. 32.82b-83a:

द्विचतुर्दण्डोऽश्वपादके ।
अर्धचन्द्रसमाकारं तत्संस्थानं प्रकल्पयेत् ॥

53. *Hasta* may designate the 'string' as well as the 'handrail' (in which case it would be used in place of *hastihasta*, cf. below v. 96 or chapter 19 v. 7 and note *ad loc.*). However in the case of stone staircases, the handrail is the top of a massive element of which the base corresponds to string; thus it is possible that string (where the steps are fixed) and handrail are in the present case considered as one and the same feature.

[171]अयुग्ममेव सोपानं गुह्यागुह्यवशात् ततः ।
[172]एकभक्तिविनिष्क्रान्तं मण्डपादिषु बाह्यतः ॥ ९४ ॥
सोपानं सर्ववर्णानां प्रादक्षिण्याधिरोहणम् ।
प्रशस्तं विपरीतं तद् विनाशाय भवेदिह ॥ ९५ ॥
अधिष्ठानाधिरोहार्थं सोपानं पार्श्वयोर्मुखम् ।
[173]हस्तिहस्तं चाश्वपादफलकान्तं प्रयोजयेत् ॥ ९६ ॥
सोपानं तदधिष्ठानस्तम्भप्रस्तरवद् भवेत् ।
[174]एवं विधिविशिष्टं तु सोपानं सम्पदां पदम् ॥ ९७ ॥
एवं प्रोक्तं तैतिलानां नराणां वासे योग्यं तोरणं चैव युक्त्या ।
सोपानं तद्भेदमाकारमस्मिन् सम्यग् योज्यं [175]वास्तुविद्याविधिज्ञैः ॥ ९८ ॥
स्यान्नागरं द्राविडवेसरं च क्रमेण वै सत्त्वरजस्तमांसि ।
महीसुरोर्वीपतिवैश्यकास्ते हरिर्विधाता हर आधिदैवाः[176] ॥ ९९ ॥

इति मयमते वस्तुशास्त्रे त्रिभूमिविधानो नाम
एकविंशोऽध्यायः

171. E : असुरं गणसोपानं
172. D : एकरुद्र-; E : एकभित्ति
173. D : omits 96b.
174. F : omits 97b.
175. E : वस्तु
176. C : आधिदेवाः

concealed (in the wall).[54] In the case of pavilions, the projection (made by the stairway) on the outside is equal to one intercolumniation.[55] For all castes, the ascent of the stairs should be effected turning to the right. If these prescriptions are not complied with, the result will be death.

96-97 For ascending the base (or the body of the ground floor or its entablature) there must be a staircase on the facade or at the sides.[56] The rail goes from the first step to the landing. The height (of this stairway) is the same as those of the base, the body of the building and the entablature. A stairway conceived according to these principles is a guarantee of success.

98 The arcatures which are suitable, depending on circumstances, for divine and human dwellings, have been described, also described in this chapter are the different forms of stairway and their various types, and this has been done following the prescriptions of the sages well versed in the science of architecture.[57]

99 There are three kinds: *nāgara*, *drāviḍa* and *vesara* (corresponding) respectively to *sattva*, *rajas* and *tamas*, that is, to brahmins, kings and *vaiśya* whose respective tutelary deities are Hari, Vidhātṛ and Hara.[58]

Thus ends, in the Mayamata, treatise on dwelling, the twenty-first chapter : RULES FOR THREE STOREYED TEMPLES.

54. Concealed staircases have been mentioned when dealing with fortified gateways (10.41).
55. The value of intercolumniation is used as relative unit when giving proportions of pavilions and similar construction; such unit is called *bhakti* (cf. 25.11 and note *ad loc.*).
56. That is to say that there is to be either a single straight staircase perpendicular to the facade or two straight staircases parallel to it and meeting on the same landing.
57. One may note that this envoi does not mention three storeyed temples which are the main subject of the chapter.
58. See above chapter 19 note 31.

अथ द्वाविंशोऽध्यायः

[चतुर्भूम्यादिबहुभूमिविधानम्]

पञ्चमानं चतुर्भौमं वक्ष्ये संक्षेपतः क्रमात् ।
[1]त्रिचतुष्पङ्क्तिहस्तादिद्विद्विहस्तविवर्धनात् ॥ १ ॥
एकद्वाविंशदन्तं तु [2]व्यासं तुङ्गं तु पूर्ववत् ।

[सुभद्रकम्]

[3]विस्तारोत्सेधमानाभ्यां भागान् वक्ष्यामि हर्म्यके[4] ॥ २ ॥
त्रयोदशकरव्यासमष्टधा विभजेत् [5]समम् ।
[6]एकांशं कूटविस्तारं [7]शालायामं द्विभागिकम् ॥ ३ ॥
[8]भागेन पञ्जरव्यासमूर्ध्वे तु पुनरष्टधा ।
प्राग्वदेव सभाशालापञ्जराणामुपर्यपि ॥ ४ ॥
[9]ऊर्ध्वे षड्भागिके भागमेकं कूटस्य विस्तृतम् ।
द्विभागं कोष्ठकायामं नीडं [10]भागार्धमिष्यते ॥ ५ ॥
तदूर्ध्वे गुणभागेंऽशं मध्ये दण्डेन निर्गमम् ।
उत्सेधं विभजेद् विद्वान् नवत्रिंशतिसंख्यया ॥ ६ ॥
सार्धद्व्यंशमधिष्ठानं पञ्चांशं पाददैर्घ्यकम् ।
तदर्धं प्रस्तरोत्सेधं [11]सत्रिपादयुगांशकम् ॥ ७ ॥
ऊर्ध्वभूम्यङ्घ्रिकोत्सेधं सपादद्व्यंशमञ्चकम्[12] ।
जङ्घा तद्द्विगुणा चोर्ध्वे द्व्यंशेन प्रस्तरोदयम् ॥ ८ ॥

1. D : त्रिचतुर्दशमारभ्य; E : त्रिचतुर्हस्तमारभ्य
2. A, D : व्यासतुङ्गं
3. E : विस्तारोत्सेधमारभ्य भागं
4. F :. वक्ष्याम्यनुक्रमात्
5. D : क्रमात्
6. D : omits 3b-4a.
7. E : शालाभाग
8. E : भागे तु
9. F : omits verse 5.
10. A (var), C : प्रागार्धम्
11. E : सत्रिभाग-
12. E : मञ्चिकम्

CHAPTER 22

TEMPLES WITH FOUR OR MORE STOREYS[1]

Four storeyed temples

1-2 Now, briefly presented, are temples with four storeys for which there are five series of possible dimensions: their width goes from thirteen or fourteen cubits to twenty-one or twenty-two by successive increments of two cubits; their height is calculated as has been previously indicated. I now lay down the proportions of the width and of the height of these temples.

Subhadraka temple (Fig. 16)

3-4 If the width is thirteen cubits it is to be divided into eight equal parts: the corner aediculae are one part wide, elongated ones two parts long and the intermediate ones one part wide. The width of the second storey is also divided into eight;[2] the corner and median aediculae are arranged as in the preceding case and above those of the ground floor.

5-6a The width of the third storey is six (eighths that of the ground floor): the corner aediculae are one part wide, the median ones two parts long and the intermediate ones half a part wide. Above that, (the width of the fourth storey) is three (eighths that of the ground floor) and a third of it, in the middle, projects by one module.

6b-10 The craftsman divides the height (of this temple) into twenty-nine parts: two and a half for base, five for the body (of the first storey) and half that for its entablature; above, the body (of the second storey) makes up four and three quarters and its entablature two and a quarter; this last number, doubled, is the height of the body (of the third storey)

1. Far more detailed descriptions are found in *Mānasāra* (chapters 22 to 30).
2. That is to say that the width of the second storey is the same as that of the first on (such is the case for Bṛhadīśvara temple at Tanjore).

[13]पादाधिकचतुर्भागमुपरिस्तम्भतुङ्गकम्[14] ।
स्यात् सत्रिभागपादेन प्रस्तरं वेदिकांशकम् ॥ ९ ॥
[15]गलोच्चमश्विनीभागं सार्धवेदैस्तु मूर्धनि ।
शेषभागं शिखामानमाहोमं[16] चतुरश्रकम् ॥ १० ॥
रविसंख्या भवेत् सौष्ठी कोष्ठं [17]तावत् तु पञ्जरम् ।
शिखरे [18]वेदनास्यः स्युश्चाल्पनास्या[19] विभूषितम् ॥ ११ ॥
स्वस्तिकाकारसंयुक्तं नासिकाभिरलङ्कृतम् ।
प्राग्वदेव तलं [20]चाधः स्तम्भालङ्कारतोरणम् ॥ १२ ॥
[21]सर्वालङ्कारसंयुक्तमेतद्धर्म्यं सुभद्रकम् ।

[श्रीविशालम्]

सर्वं प्राग्वत् [22]कूटकोष्ठादि युक्त्या मध्ये मध्ये[23] मस्तकं मण्डलाभम् ॥१३॥
वृत्ताकारं स्यात् सभानां शिरस्तद्विस्तारार्धेनान्वितं गर्भगेहम् ।
शेषं [24]त्र्यंशेनावृतावासपिण्डिस्तत्तुल्यं तद्बाह्यतोऽन्धारहारम् ॥ १४ ॥
नानाधिष्ठानाङ्घ्रिवेद्यादियोगं नाम्नेदं स्याच्छ्रीविशालं सुहृष्टम्[25] ।

[भद्रकोष्ठम्]

पञ्चदशकरव्यासं[26] नवधा विभजेत्[27] क्रमात्[28] ॥ १५ ॥
गर्भगेहं त्रिभागैकं गृहपिण्ड्यस्तदंशकम्[29] ।
अंशेन परितोऽलिन्द्रं खण्डहर्म्यं तथांशकम्[30] ॥ १६ ॥

13. E : omits verse 9.
14. F : दीर्घिकम् : G : दीर्घिका
15. F : omits verses 10 to 14.
16. A, B, G : आभोगं; E : होमोच्चं
17. E : नामस् instead of तावत्
18. A, C : देवनास्यः
19. E : चतुर्नास्या for चाल्पनास्या
20. G : चाथ
21. D : स्तम्भा-
22. E : कूटकोष्ठादिकानां युक्त्या मध्ये मस्तकम्
23. D : स्तम्भकं for मस्तकं; G : मस्तके
24. E : द्वय-
25. G : सुभद्रम्
26. E : व्यासे
27. E : भाजिते
28. G : समम्
29. E : तदंशकैः; G : तदर्धतः
30. E : तथांशके

whose entablature makes up two parts of the height. The body (of the fourth storey) makes up four and a quarter parts and its entablature one and a quarter; the stereobate of the attic makes one and the attic itself two, the roof four and a half and the (two parts) which remain are for the finial. The plan is square from the base.[3]

11-13a There are twelve corner aediculae and the same number of median and intermediate ones, and there are four niches in the roof. It is decorated with small niches and *svastika* false dormer windows. The base has been given above and so are the pillars, the ornaments and the arcatures. Such a building, supplied with all the ornaments is called *subhadraka*.

Śrīviśāla temple

13b-15a This building is called *śrīviśāla* however when, the aediculae being placed at the corners or in the middle depending upon circumstance, the roof is circular;[4] the roof of the corner aediculae is also circular. The sanctum occupies half the width of the building; the thickness of the interior wall one third of the remainder and the same goes for the aisle and the exterior wall.[5] All types of base, pillar, stereobate (etc.) are suitable for this temple.

Bhadrakoṣṭha temple

15b-16 If the width is fifteen cubits it must be divided into nine equal parts: three for the width of the sanctum and, (on each side), one for the thickness of the interior wall, one for the width of the aisle and one for that of the (exterior wall with) engaged structures.

3. *Homa*: literally 'from the adjustment layer (of the base)'; cf. chapter 14 note 8.
4. We do not know if the corner aediculae are of circular plan like their roof (cf. *vṛttakūṭa* temple, 21.48b-49.
5. *Vṛtāvāsapiṇḍi*: cf. *gṛhapiṇḍi* (chapter 21 note 29).

सभा शाला तथा नीडं भागेनैकेन विस्तरात् ।
[31]विस्तार[32]त्रिगुणायामा स्वव्याससमनिर्गमा ॥ १७ ॥
[33]शालामध्ये महानासी भागतत्या विनिर्गता ।
सभाकोष्ठकनीडानामन्तरेऽर्धेन हारकम्[34] ॥ १८ ॥
[35]तदुपर्यष्टभागेन विभजेत् कूटमंशकम्[36] ।
[37]कोष्ठकस्य तु विस्तारं तदेव द्विगुणायतम् ॥ १९ ॥
[38]कूटशालान्तरे नीडमंशेन परिकल्पयेत् ।
तदूर्ध्वे रसभागे तु कूटमंशेन कोष्ठकम् ॥ २० ॥
विस्तारद्विगुणायाममन्तरेऽर्धेन[39] पञ्जरम् ।
ऊर्ध्वभूमे चतुर्भागे[40] मध्ये दण्डेन निर्गमम् ॥ २१ ॥
अष्टाश्रं कर्णकूटं स्यात् कोष्ठकं क्रकरीकृतम्[41] ।
महाशिखरमष्टाश्रमष्टनास्या विभूषितम् ॥ २२ ॥
कूटकोष्ठकनीडानां संख्यायां पूर्ववत् ततिः[42] ।
अस्याप्युत्सेधभागं च पूर्ववत् परिकल्पयेत् ॥ २३ ॥
भद्रकोष्ठमिदं नाम्ना वेदभौमं दिवौकसाम् ।

[जयावहम्]

सप्तदशकरव्यासं [43]दशभागैर्विभाजयेत्[44] ॥ २४ ॥
[45]नालीगृहं चतुर्भागमंशेनान्धारिका भवेत् ।
[46]अलिन्द्रमंशमंशेन परितः खण्डहर्म्यकम् ॥ २५ ॥

31. G : omits 17b-18a.
32. D, E : द्विगुणा-
33. E : omits 18a.
34. E : पञ्जरम्
35. G : omits 19a.
36. D : कूटमस्तकम्
37. D : कोष्ठकस्तं for कोष्ठकस्य
38. G : omits 20a.
39. G : अन्तरेण तु for अन्तरेऽर्धेन
40. G : भागं
41. D : कर्करीकृतम्
42. E : संख्या पूर्ववदेव तु
43. E : दशभागं
44. F : च भाजयेत्
45. F, G : गर्भगेहं चतुर्भागैः गृहपिण्डिरयाधिकम् ।
46. F : अंशेन परितोऽनिन्द्रं खण्डहर्म्यं तथांशकम्

17-18 The width of the corner, elongated and intermediate aediculae is one part; the length (of the elongated aediculae) is triple their width, which is equal to their projection; these aediculae comprise a large central niche whose width and depth make up one part.[6] Between corner aediculae, median aediculae and intermediate ones, are dwarf-galleries half a part wide.

19-20a The width of the second storey is eight (ninths) that of the ground floor; the width of the aediculae is to be one part and so is that of the median aediculae whose lenght is twice that; the width of the intermediate ones which are to be disposed between corner and median aediculae one part.

20b-21 Above this, the width (of the third storey) is six (ninths that of the ground floor); the corner aediculae are one part wide as are the median aediculae whose length is double their width; between these are intermediate aediculae half a part wide. Above, (the width of the top storey) is four (ninths that of the ground floor) and it projects in the middle by one module.

22-24 The corner aediculae (of this temple) are octagonal and the median ones cruciform.[7] The large sized roof is octagonal and decorated with eight niches. The total number of aediculae is the same as above. The distribution of the elevation is to be made according to what has already been said.[8] The name of this four storeyed temple is *bhadrakoṣṭha.*

Jayāvaha temple

24b-25 When the width is seventeen cubits it is to be divided into ten equal parts: four for the sanctum and, (on each side), one for the interior wall as for the aisle and the (exterior wall with) engaged structures.

8. Cf. vv. 6b-10.
6. Same arrangement for the three storey *bhadrakoṣṭha* temple (21.40b sq).
7. *Krakarīkṛta*: that term seems to imply that aediculae are shaped like buildings with four cardinal foreparts (see also 24.128: *krakarakoṣṭha*).

[47]कूटं कोष्ठं च नीडं च भागेन परिकल्पयेत् ।
कोष्ठायामं द्विभागं स्याच्छेषं हारा सपञ्जरम्[48] ॥ २६ ॥
जलस्थलं विहायोर्ध्वे वसुभागैर्विभाजिते[49] ।
भागेन कूटविस्तारं कोष्ठकं द्विगुणायतम् ॥ २७ ॥
[50]हारान्तरे तथांशेन लम्बपञ्जरमीरितम् ।
[51]तदूर्ध्वे रसभागे[52] तु भागं सौष्ठिकविस्तृतम् ॥ २८ ॥
द्विभागं कोष्ठकायामं हारायां क्षुद्रपञ्जरम्[53] ।
तदूर्ध्वे तु त्रिभागेन मध्ये दण्डेन निर्गमम् ॥ २९ ॥
[54]चतुरश्रमधिष्ठानमष्टाश्रं गलमस्तकम् ।
त्रिचतुष्कोष्ठकं तावत् सौष्ठिकं चाष्टपञ्जरम् ॥ ३० ॥
लम्बपञ्जरमष्टौ हि क्षुद्रनीडं द्विरष्टकम्[55] ।
[56]गलनास्यष्टसंयुक्तं कोष्ठकं किञ्चिदुन्नतम् ॥ ३१ ॥
नानामसूरकस्तम्भवेदीजालकतोरणम् ।
नानालङ्कारसंयुक्तं नानाचित्रैर्विचित्रितम् ॥ ३२ ॥
सोपपीठमधिष्ठानं केवलं वा मसूरकम् ।
स्वस्तिकाकारसंयुक्तं नासिकाभिरलङ्कृतम्[57] ॥ ३३ ॥
पूर्ववत् तुङ्गभागं स्यादेतन्नाम्ना जयावहम् ।

[भद्रकूटम्]

[58]नवपङ्क्तिकरव्यासे दशभागविभाजिते ॥ ३४ ॥

47. F, G : कूटकोष्ठकनीडानां भागेनैव प्रकल्पयेत्
48. E : हारासमन्वितम्; G : हारास्वपञ्जरम्
49. E : वसुभागैर्विभागोर्ध्वे; F : वसुभागेन भाजयेत्; G : वसुभागं तु भाजयेत्
50. G : हारान्तरं तथांशेन तस्मिन् स्यात् लम्बपञ्जरम्
51. C : omits 28b-29a.
52. G : नवभागे
53. F, G : हारासक्षुद्रपञ्जरम्
54. E : चतुरश्रमधिष्ठानं षडश्रं वेदिकागलम्
55. C : द्विरिष्टकम्; F : द्विरष्टभिः
56. G : गलं
57. F, G : नासिकाभूषणं भवेत्
58. F : omits verses 34b-60.

26-27a The width of the corner, elongated and intermediate aediculae is one part; the length of the median aediculae is double their width and what is left is for dwarf-galleries which bear niches.

27b-28a Above this, when a place has been left for the gutter, there remains eight (tenths of the width of the ground floor) for the width of the second storey;[9] the corner aediculae are one part wide and the median ones are twice as long as that; between them dwarf galleries with overhanging intermediate aediculae also make up one part.

28b-29 Above this, (the width of the third storey) is six (tenths that of the ground floor); the width of the corner aediculae is one part, the length of the median ones two and, (between them), are dwarf-galleries with small niches on them. Next above, (the width of the fourth storey) is three (tenths that of the ground floor) and it projects by one module, at its middle.

30-34a The base (of this temple) is square, its attic and its roof are octagonal; it has twelve elongated aediculae and as many corner ones as well as eight intermediate ones; there are eight overhanging niches and sixteen small false dormer windows; on its attic there are eight other false dormer windows. The elongated aediculae are slightly elevated. All kinds of base, pillar, stereobate, window, arcature and ornamentation are appropriate for this building. It is decorated in various colours. Its base may or may not be on a socle. All round, (on the entablature), is a decoration of *svastika* false dormer windows. The vertical disposition of elements is the same as in the preceding case. This type is called *jayavāha*.

Bhadrakūṭa temple

34b-36 When the width is nineteen cubits it is to be divided into ten (equal parts): four for the width of the sanctum and, (on each side), one for the

9. The gutter (*jalasthala*, cf. 21.57: *varṣasthala*) is placed behind the row of aediculae crowning the entablature of the first storey; it runs along the wall making the level of pillars of the second storey.

गर्भगेहं चतुर्भागं गृहपिण्डिस्तदंशके ।
[59]अन्धारमंशमंशेन परितः खण्डहर्म्यकम् ॥ ३५ ॥
कूटकोष्ठकनीडानां [60]तारमंशेन योजयेत् ।
कोष्ठकं द्विगुणायामं हारा भागसमन्विता[61] ॥ ३६ ॥

[कपोतपञ्जरम्]

पञ्चांशे सौष्ठिकव्यासे [62]मध्ये द्व्यंशेन विस्तरम्[63] ।
एकभागविनिष्क्रान्त[64]युग्मस्तम्भसमन्वितम् ॥ ३७ ॥
सोपपीठमधिष्ठानं समञ्चं सवितर्दिकम्[65] ।
सकन्धरशिरोयुक्तं सर्वालङ्कारसंयुतम् ॥ ३८ ॥
पादुकोत्तरयोर्मध्ये नवांशेनोपपीठकम् ।
[66]मसूरकं द्विभागोच्चं द्विगुणं स्तम्भदैर्घ्यकम्[67] ॥ ३९ ॥
सार्धांशं प्रस्तरोत्सेधमर्धांशं वेदिकोदयम् ।
उत्तरादिकपोतान्तं गलोदयमितीरितम् ॥ ४० ॥
[68]पञ्जराकृतिसंयुक्तं [69]कपोतात् तु विनिर्गतम् ।
यथाशोभं यथायुक्ति तथा शक्तिध्वजान्वितम् ॥ ४१ ॥
[70]कपोतपञ्जरं ह्येतत् प्रासादे सार्वदेशिके ।
हारायां वाऽथ शालायां मध्ये मध्ये तु योजयेत् ॥ ४२ ॥

[पुनः भद्रकूटम्]

कूटकोष्ठकनीडं चैवान्तरप्रस्तरान्वितम् ।
जलस्थलं विहायोर्ध्वभूमावष्टांशसौष्ठिकम् ॥ ४३ ॥

59. E : अंशेनार्धरमंशेन
60. E : हारमंशेन
61. G : समन्वितम्
62. E : ऊर्ध्वे
63. E : योजयेत् instead of विस्तरम्
64. E : युग-
65. E : मञ्चमङ्घ्रिवितर्दिकम्
66. C : मसूरक-; D : अंधारस्य
67. G : तुङ्गकम्
68. G : omits 41a.
69. D : कपोताकृतिनिर्गमम्; E : कपोतान्तं विनिर्गतम्
70. E : omits 42-43a.

thickness of the interior wall, one for the width of the aisle and one for the width of the (exterior wall with) engaged structures surrounding it. The width of the corner, elongated and intermediate aediculae takes up one part, the length of the elongated aediculae two, and there are one part wide dwarf-galleries.

The kapotapañjara[10]

37-40 The width of the porch set into the middle of a corner aedicula is two fifths the width of the latter and its depth one fifth. (This niche) is flanked by two colonettes and is provided with socle, base, entablature, stereobate, attic and roof and with all necessary decoration. It extends from the level of the base (of the aedicula) to its architrave. Its height being divided into nine parts, its socle makes up one part, its base two, its pillars twice that, its entablature one and a half and the stereobate of its attic a half; the height of its attic is equal to the distance between architrave and cornice.

41-42 It is shaped like a 'cage' and recessed in relation to the cornice.[11] According to circumstance and to appearance desired, it may be surmounted by a pole. This *kapotapañjara* is appropriate for all types of temple and should be placed at the centre of dwarf-galleries or of corner or elongated aediculae.

Bhadrakūṭa temple (cont.)

43-44a The corner, elongated and intermediate aediculae are placed upon a stereobate.[12] Above that, leaving aside the space for the gutter, there remain eight (tenths of the width of the ground floor for that of the

10. The description of *kapotapañjara* (literally 'cage for pigeon' see note 11) breaks in on that of *bhadrakūṭa* temple (resumed with v.43); that decorative element placed against the facade of an aediculae makes up a protruding porch and is the different from *pañjara* (which are aediculae, chapter 20 note 28). It looks like the frontage of a one storey building or that of a *pañjara* type aedicula.
11. The choice of *kapota* to designate the cornice allows to play on the original meaning of *pañjara*: 'cave, aviary'. The *kapotapañjara* is similar to the frontage of an intermediate aedicula (*pañjara*) interrupting a dwarf-gallery between a *kūṭa* and a *koṣṭha* as well as to a cage of which its two colonettes would be the bars.
12. *Antaraprastara*: cf. chapter 20 note 9.

द्विगुणं कोष्ठकायामं तयोर्मध्ये तु पञ्जरम् ।
तदूर्ध्वे रसभागे तु सौष्ठिकोष्ठं तु पूर्ववत्[71] ॥ ४४ ॥
विजयस्य यथा प्रोक्तं शेषमूर्ध्वे तु योजयेत् ।
[72]कूटकोष्ठादि सर्वाङ्गं पूर्ववत् संख्यया विदुः ॥ ४५ ॥
महानीडं द्विरष्टौ स्यान्नाम्नेदं भद्रकूटकम् ।

[मनोहरम्]

तदेवान्यदलङ्कारं शालामध्ये सभद्रकम् ॥ ४६ ॥
वृत्तग्रीवाशिरोयुक्तमेतन्नाम्ना मनोहरम् ।

[आवन्तिकम्]

तदेवान्यदलङ्कारं वेदाश्रं कन्धरं शिरः ॥ ४७ ॥
नानामसूरकस्तम्भवेदिकाद्यैरलङ्कृतम् ।
[73]नाम्नावन्तिकमित्युक्तं शम्भोर्मन्दिरमुत्तमम् ॥ ४८ ॥

[सुखावहम्]

त्रिःसप्तहस्तविपुले चतुरंशनाली
धर्मांशकेंऽशमभितो गृहपिण्डिमानम् ।
अन्धारमंशमभितोंऽशकमङ्गहारं[74]
कूटं च नीडमथ कोष्ठकमंशतारम् ॥ ४९ ॥
[75]शालायतं द्विगुणमंशकतारहारं
वातायनैर्मकरतोरणकैर्विचित्रम् ।
त्यक्त्वा जलस्थलमुपर्यपि चाष्टभागे
कूटं च नीडमथ कोष्ठकमंशतत्या ॥ ५० ॥

71. E : सौष्ठिकौत्तुङ्गं पूर्ववत्
72. D and G omit 45b-49.
73. E : नाम्ना मन्दिरमित्युक्तं
74. E : अङ्गतारं
75. E : omits verse 50.

second storey); the corner aediculae are one part wide and the length of the median ones twice that; there are intermediate aediculae between them.

44b-46a Above, (the width of the third storey) is six (tenths that of the ground floor); the corner and median aediculae are as has been given above. For the fourth storey the procedure is as has been prescribed for the *vijaya* type.[13] It should be known that the number of all elements such as aediculae is as given above but that there are sixteen large niches too. This type is called *bhadrakūṭa*.[14]

Manohara temple

46b-47a If the decoration is different however, comprising elongated aediculae with median projection, and if the roof and the attic are circular plan, this is said to be a *manohara* building.

Āvantika temple

47b-48 Or again, if the decoration is different and if the roof and the attic are square plan, this is said to be *āvantika*; all types of base, pillar, stereobate (etc.) are fitting for it and it is considered a perfect abode for Śambhu.

Sukhāvaha temple

49-50a When the width is twenty-one cubits, it is to be divided into ten parts; four for the width of the sanctum and, (on each side), one for the thickness of the interior wall, one for the width of the aisle and one for the thickness of the outside wall.[15] The corner aediculae, the intermediate and the elongated ones are one part wide; the length of elongated median aediculae is double (their width) and dwarf-galleries are one part wide. The decoration comprises windows and *makaratoraṇa*.[16]

13. That *vijaya* type is probably same as *jayāvaha* type described above (vv. 24b-34a).
14. The corner aediculae (*kūṭa*) of that temple must have protruding *kapotas-pañjara* (described above) on their facades, hence its name *bhadrakūṭa*: 'with corner aediculae endowed with projections' (cf. *bhadrakoṣṭha*, chapter 21 note 30).
15. *Aṅgahāra*: "the recesses (of the external wall) with the (projecting) elements (they separate)"; the (projecting) elements are the engaged structures set in the wall (see chapter 21 notes 24 and 29).
16. *Makaratoraṇa*: see 21.69 sq.

[76]शालायतं द्विगुणमूर्ध्वतले षडंशे
सौष्ठ्यंशमंशविपुलं द्विगुणायतं स्यात् ।
कोष्ठं च नीडविपुलं हि तदर्धभागं
चोर्ध्वं युगांशिनयनांशकमध्यभद्रम् ॥ ५१ ॥
[77]दण्डेन निर्गममुपर्यपि भद्रनीडं
सार्धं द्विदण्डविपुलं गलनासिकं च[78] ।
वृत्ताभकन्धरवितर्दिकमस्तकं स्या-
दष्टार्धनासिकमदभ्रमथाल्पमष्टौ ॥ ५२ ॥
कूटं च नीडमथ कोष्ठकमुन्नतं स्या-
दादौ तले तदपि मध्यममञ्चयुक्तम् ।
शालोन्नतं ह्युपरि चोन्नतमूर्ध्वकूटं
वृत्ताभमत्र वसुपट्टशिरस्तु मध्ये ॥ ५३ ॥
वेदाश्रकूटशिखरं ह्यथ मूलभूमौ
नासाल्पकं ह्युपरि वेधविहीनबन्धम्[79] ।
[80]नानामसूरकसहाङ्घ्रिकशोमिताङ्ग[81] ।
नाम्ना सुखावहमिदं सुरमन्दिरं स्यात् ॥ ५४ ॥

[पञ्चभूमिविधानम्]

सत्रिपादयुगलार्धपञ्चकैर्द्व्यर्धसाङ्घ्रिशर[82]सार्धनेत्रकैः ।
पञ्चभागिकस[83] भागनेत्रकैस्त्र्यङ्घ्रिवेदनयनार्धवेदकैः ॥ ५५ ॥
त्र्यङ्घ्रिकांशकशिवद्विपादगङ्गाश्विनीभिरुदये षडष्टके ।
[84]कुट्टिमं चरणमञ्चपादकं प्रस्तरं तलिपमञ्चमङ्घ्रिकम् ॥ ५६ ॥

76. C : समालायतं
77. C : दण्डैर्विनिर्गमम्; G : दण्डे विनिर्गमम्
78. G : स्यात्
79. E, G : स्वस्तिकबन्धयुक्तम्
80. G : omits 54b-57a.
81. E : शोभयुक्तम्
82. शिर instead of शर- in all the texts.
83. D : पाद- instead of भाग-
84. D : omits 56b-57.

50b-52a Above, again, the space for the gutter having been set aside, there remain eight (tenths of the width of the ground floor for that of the second storey). Corner, elongated and intermediate aediculae are one part wide, whilst the length of the elongated aediculae is double that. Above this, (the width of the third storey) is six (tenths that of the ground floor); the corner aediculae are one part wide, the median aediculae twice as long and intermediate ones are one part wide. Above again, (the width of the fourth storey) is four (tenths that of the ground floor); its middle part occupies half the width and projects by one module; there is a false dormer window above this projection. The attic niches are two and a half digits wide. The attic, its stereobate and the roof are circular plan; there are eight big engaged niches and eight small ones (in the roof).

53-54a On the first storey, corner, median and intermediate aediculae are elevated by a stereobate.[17] Above this, it is the median aediculae which are elevated and, higher up, it is the corner aediculae, which are circular plan although their roof is octagonal on the median (storey). On the first storey, however, the roof of the corner aediculae is square plan and there is a false dormer window above it without an opening.[18]

54b The name of this divine palace is *sukhāvaha*; it may have any sort of base, pillar and decoration.

Five storeyed temples

55-57a The height of a five storeyed temple is to be divided into forty-eight equal parts: two and three quarters for the base, five and a half for the body (of the first storey), two and a half for its entablature, five and a quarter for the body (of the second storey) and two and a half for its

17. *Madhyamamañca: mañca* being synonymous to *prastara* ('entablature'), that compound is equivalent to *antaraprastara* (above v. 43).

18. *Nāsālpakam . . . vedhavihīnakam*: that means perhaps that the false dormer window set upon the roof of the aedicula is a blind one without any decoration on its pediment.

प्रस्तरं तलिपमञ्चवेदिकं कन्धरं शिखरकुम्भकं क्रमात् ।
पञ्चभौममुदितं विशालके नन्दपङ्क्तिभिरथेन्द्रियांशकैः ॥ ५७ ॥

[षडाद्यैकादशभूम्यन्तविधानम्]

उच्छ्रये तदधः षड्भिर्गुणांशैरङ्घ्रिकं तलम् ।
षड्भौममेवमुद्दिष्टं ताराभागं तथा भवेत् ॥ ५८ ॥
तदधः सार्धषड्भागैः सपादगुणभागकैः[85] ।
स्तम्भं मसूरकं कुर्यात् तारे रुद्रार्कभागतः ॥ ५९ ॥
सप्तभौममिदं प्रोक्तं विमानं सार्वदेशिकम्[86] ।
तदधो मुनिभिः [87]सार्धगुणांशैः स्तम्भकुट्टिमम् ॥ ६० ॥
[88]धर्मरुद्रार्कभागैस्तु सत्रयोदशभागिकैः[89] ।
अष्टभौमं वदन्त्यस्मिन्नेवं[90] प्राज्ञा मुनीश्वराः ॥ ६१ ॥
तदधः सार्धसप्तांशैः सत्रिपादगुणांशकैः ।
स्तम्भं च [91]तलकं कुर्यात् तारेंऽशं तत्र पूर्ववत् ॥ ६२ ॥
एवं नवतलं प्रोक्तं दशभौममथोच्यते ।
तदधोऽष्टयुगांशैस्तु पादं मसूरकं भवेत्[92] ॥ ६३ ॥
तारे पूर्वोक्तभागैस्तु मनुभागैरथापि वा ।
तदधः सार्धवस्वंशैः सपादयुगभागिकैः ॥ ६४ ॥

85. E : भागिकैः
86. G : देशिके
87. A, C, E : सार्धं
88. E : धानं रुद्राद् भागैस्तु; F, G : तारे रुद्रार्कभागैस्तु
89. A : भागिकः
90. D : अस्यैवं
91. E : तलिपं
92. E : पादमर्धमासूरकम्

entablature; five for the height of the body (of the third storey) and two and a quarter for its entablature, four and three quarters for the body (of the fourth floor) and two for its entablature; four and a half for the body (of the fifth storey) and one and three quarters for its entablature; one for the stereobate of the attic, two for the attic itself, four and a quarter for the roof and two for the finial.

57b The width (of a five storey temple) is to be divided into nine, ten or eleven equal parts.[19]

Temples with six to eleven storeys[20]

58 If (a storey is added), below the elevation (thus obtained), whose body makes six parts and whose base three, a six storey temple results, the width of which is of the same proportions as those given above.[21]

59-60a If (another storey is added) below that, with a body of six and a half parts and a base of three and a half, whilst its width is divided into eleven or twelve parts, the result is a seven storey temple, fitting under any circumstance.

60b-61 If (another storey is added) below that, whose body is seven parts and base three and a half and whose width is divided into ten, eleven, twelve or thirteen parts, an eight storey temple is obtained according to the leading experts.

62-63a If (yet another storey is added) below that, with a body of seven and a half parts and a base three and three quarter parts and whose width is of the same proportions as given above, the result is a nine storey temple.

63b-64a For a ten storey temple (there is added) below (another body) of eight parts on a base of four; the proportions of its width are as given above or else it may be divided into fourteen parts.

19. *Indriya* value of 'eleven' is probably derived from *Bhagavadgītā* 13.5:

महाभूतान्यहङ्कारो बुद्धिरव्यक्तमेव च।
इन्द्रियाणि दशैकं च पञ्च चेन्द्रियगोचराः ॥

20. Temples with more than five storeys are presented as mere extrapolations of five storeyed buildings: six storey temples are obtained by adding one storey below the first storey of five storeyed ones (that first storey becoming the second storey of the six storeyed temple), seven storey temples by adding one storey below the first storey of six storeyed temples. etc. For a similar process used to describe gateways see chapter 30 vv. 108b-109.

21. That is to say, in the description of five storey temples.

स्तम्भं मसूरकं कुर्यात् तारे तद्वच्च पक्षकैः ।
[93]तथा द्विरष्टभागैस्तु सप्तदशांशकैस्तु वा[94] ॥ ६५ ॥
एकादशतलं प्रोक्तं द्वादश[95] क्षममुच्यते ।

[द्वादशतलविधानम्]

तदधो नन्दनन्दार्धभागैः स्तम्भं मसूरकम् ॥ ६६ ॥
[96]तारे द्विरष्टभागादि यावदर्कद्वयांशकम् ।
[97]गृहपिण्ड्यलिन्द्रहारा[98] गर्भागाराद् बहिः क्रमात् ॥ ६७ ॥
हर्म्यस्यावधिकं यावन्नीयते[99] तावदंशकैः ।
द्वित्रिवेदेषु षड्भागैः प्रागुक्तांशैस्तु वा गृहम् ॥ ६८ ॥
[100]एकार्धेनाथवालिन्द्रं शेषं कुड्येषु योजयेत् ।
केचित् [101]त्रिर्नवभिर्भागैर्वदन्ति द्वादशावनौ ॥ ६९ ॥
षट्कुड्यं पञ्चसालिन्द्रं [102]बहिः कूटादिशोभितम् ।
कूटं कोष्ठं च नीडं च क्षुद्रशालेभतुण्डकम्[103] ॥ ७० ॥
यथाशोभमलङ्कारं तथा युञ्जीत बुद्धिमान् ।
[104]युग्महस्तैरयुग्मैर्वा योजयेदेवमिच्छया ॥ ७१ ॥
युग्मांशे द्व्यंशकं वाऽपि [105]कूटव्यासं द्विरायतम्[106] ।
[107]शालायाश्चतुरंशैर्वा [108]युग्मे युग्मांशकैर्विदुः ॥ ७२ ॥
[109]नानाभागैरलङ्कारैरन्यैरुक्तं[110] मुनीश्वरैः ।
तथा वा तत्र युञ्जीयात् प्राज्ञः शिल्पिषु बुद्धिमान् ॥ ७३ ॥

93. E : ततो
94. G : सप्तदशविभागिकैः
95. E : क्षुद्रम् for क्षमम्
96. F : तारे रुद्रार्कभागैस्तु
97. E : गृहपिण्डग्रहाराश्च
98. A (var), C : हाराश्च; F, G : हारांश्च
99. C : नीयन्ते
100. D, F : भागार्धेनाथावलिद्रं; E : भागार्धेनापि वालिद्रं
101. F : तु तव- for त्रिर्नव-
102. D : बहु
103. D : एकतुण्डकम्
104. E : युग्मषष्ठैर्
105. D : कृत-
106. C : चिरायतम्
107. D : शालाश्चतुरंशैर्वा
108. E : युग्म
109. E : नानापदैर्; F : नानाहारैर्
110. E : युक्तं for उक्तं

64b-66a If, (once again, a storey is added) below, whose body is eight and a half parts and base four and a quarter and the proportions of whose width is as given above, if not divided into fifteen, sixteen, or seventeen, the result is an eleven storey temple.

Twelve storeyed temples[22]

66b-67a Next, as regards a twelve storey temple: (a storey should be added) below, whose body is nine parts and base four and a half[23] and whose width may be divided into from sixteen to twenty-four parts.

67b-69a Starting with the sanctum and proceeding towards the exterior up to the limits of the building, the interior wall, aisle and exterior wall should be arranged successively. Here are their proportions: the sanctum is two, three, four or six parts in which if its proportions are not the same as those previously indicated; the aisle is one or one and a half parts wide and the remainder is for the walls.

69b-70a There are those, though, who say that the width of a twelve storey temple is to be divided into twenty-seven parts, of which six are for the walls and five for the aisle.

70b-71a There is a decoration of corner aediculae (etc.) on the exterior. Corner, elongated and intermediate aediculae as well as small aediculae which extend like elephants' trunks[24] should be arranged by the expert, according to appearance desired and to what is decorative.

71b (The dimensions of temples) may be calculated in an even or odd number of cubits, as is preferred.

72 The width of the corner aedicula is two parts if the number of these (in the total width), is even; the length of the elongated aedicula is twice as much, or else (the width of the corner aedicula) may be four parts; at all events, it is to be understood that (this width) must be expressed in an even number if the total number of parts is even.

73 The expert, eminent amongst architects, must proceed according to these rules or to the different proportions and arrangements prescribed by the great sages.

22. One may note that temples with thirteen and sixteen storeys are not mentioned here, while they appear in chapter 11 (v. 19).
23. *Nandārdhabhāga*: literally 'nine times a half'.
24. *Kṣudraśālebhatuṇḍaka*:? (see also below v. 85).

[खण्डहर्म्यम्]

[111]तलमेकं भवेद् ग्रासं खण्डहर्म्यं चतुःस्थले[112] ।
द्वितलं पञ्चषट्सप्तभूमावेव विधीयते ॥ ७४ ॥
त्रितलं चाष्टभूमे[113] तु नन्दपङ्क्तितले तथा ।
[114]पञ्चभौमं चतुर्भौमं द्वादशैकादशे तले ॥ ७५ ॥

[कूटकोष्ठादि]

मूलतः कूटकोष्ठादीन् यः कर्तुं सम्यगीहते[115] ।
तले तले विभागांश्च यथायुक्त्या प्रयोजयेत् ॥ ७६ ॥
कूटकोष्ठादिसर्वाङ्गमुपर्युपरि पूर्ववत् ।
कूटकोष्ठकनीडाद्यैर्भेदैराख्या यथोदिता ॥ ७७ ॥
[116]पूर्वं तैर्भेदकैर्युक्तस्याख्या धाम्नस्तथा भवेत् ।
आद्वादशतलादेवं युञ्जीयाद् द्वितलादितः ॥ ७८ ॥
[117]कर्णे मध्ये तयोर्मध्ये कूटं कोष्ठं च पञ्जरम् ।
[118]कर्तव्यं मानसूत्रात् तु[119] तेषां निर्गममुच्यते ॥ ७९ ॥
[120]स्वव्यासार्धं तथार्धार्धं दण्डं [121]वा द्वित्रिदण्डकम् ।
अन्तर्विन्यासदेशं[122] तु मानसूत्रं न[123] योजयेत् ॥ ८० ॥
[124]ऋजु[125]सूत्रप्रमाणान्तं तद्भङ्गे विपदां पदम् ।
[126]तस्मात् कूटादिसर्वाङ्गं मानसूत्राद् बहिर्नयेत् ॥ ८१ ॥

111. D : तले मोक्षं; G : तलमेवं
112. E : स्थलम्
113. C : भूमौ
114. E, G : पञ्चभूमं चतुर्भूमं
115. E : सम्यगिष्यते; F, G : हर्म्यहृते
116. E : पूर्वं तद्भेदयुक्तं ह्याख्या धम्निस्थिता भवेत्
117. D : कण्ठमध्ये
118. G : कर्तुं मुनिसूत्रासु दोषनिर्गममुच्यते
119. E : सूत्रं तु
120. C : omits 80a.
121. A (var) : वापि त्रिदण्डकम्; C : वाद्विद्विदण्डकम्; E : वादि-
122. D : वेशं for देशं; E : शेषं
123. C, D : मानसूत्रान्तं for मानसूत्रं न
124. G : omits 81-84.
125. D, E : सूत्रप्रमाणं तत्
126. E : सर्वाङ्गं मानसूत्रं तु बहिर्बहिर्विवर्तयेत्

Engaged structures

74-75 If the temple is four-storeyed, the engaged structures should be elevated to the height of the first storey; if it is five, six or seven-storeyed, to the second storey; if it is eight, nine or ten-storeyed, to the third; lastly, if it is eleven-storeyed they go up to the fourth storey and if twelve-storeyed, to the fifth one.[25]

Aediculae

76-78a Whosoever wishes to arrange elements such as aediculae, starting from the first storey, must reduce their proportions appropriately, storey by storey. All elements such as square and elongated aediculae may be arranged on each storey as indicated above. The kinds of square, elongated and intermediate aediculae (etc.) used (on engaged structures) should be the same as those proper to the building itself which have been previously indicated.

78b-79a Square aediculae should be placed at the corners of two to twelve storey temples, elongated ones in the middle, and intermediate ones between them.

79b-81 These elements are to project in relation to the reference line (of the corresponding storey);[26] this projection is equal to half or a quarter their width or it is one, two or three digits. The reference line is not to extend into the interior of the fixed space(?); a straight line marks the extremity (of the projecting elements); if it is broken this will be a source of misfortune; as well as elements such as aediculae should be outside the reference line.

25. *Khaṇḍhabarmya*: cf. chapter 20 note 15; the meaning is here that the facades of upper storeys are straight while those of the lower storeys are articulated with projections and recesses.

26. *Mānasūtra*: see above 21.21-23a.

[127]चतुरश्रं तु वस्वश्रं षोडशाश्रं तु वर्तुलम् ।
[128]मस्तकं स्तूपिकोपेतं कूटं कर्णयुतं मतम् ॥ ८२ ॥
मध्यनासिसमोपेतमर्धकोटिसमन्वितम् ।
मुखपट्टिकयोपेतं शक्तिध्वजसमायुतम् ॥ ८३ ॥
अनेकस्थूपिकोपेतं कोष्ठकं मध्यमे भवेत् ।
[129]हस्तिपृष्ठनिभं पृष्ठे शालाकारं मुखं मुखे ॥ ८४ ॥
पञ्जरं विहितं कूटकोष्ठयोरन्तरे बुधैः[130] ।
पार्श्ववक्त्रं तदेवेष्टं हस्ति[131]तुण्डं समण्डितम्[132] ॥ ८५ ॥
[133]एष जातिक्रमः प्रोक्तः कर्णकोष्ठसमन्वितम्[134] ।
मध्ये कूटं तयोर्मध्ये क्षुद्रकोष्ठादिशोभितम्[135] ॥ ८६ ॥
छन्दमेतत् समुद्दिष्टं कूटं वा कोष्ठकं तु वा ।
अन्तरप्रस्तरोपेतनिम्नं वोन्नतमेव वा ॥ ८७ ॥
विकल्पमिति निर्दिष्टमाभासं तद्विमिश्रितम् ।
क्षुद्राल्पमध्यमोत्कृष्टं हर्म्याणामेवमीरितम् ॥ ८८ ॥
जात्यादिभेदकैर्युक्तं विमानं सम्पदां पदम् ।
विपरीते विनाशाय भवेदेवेति निश्चयः[136] ॥ ८९ ॥

127. E : omits verse 82.
128. E : वर्तुलं
129. E : हस्तिपृष्ठे तु शालाया कोष्ठे कोष्ठमुखे मुखे
130. E : कूटकोष्ठैरन्तरैर्बुधैः
131. F : कुण्डं
132. D : समण्डनम्
133. D : एकजातिक्रमं प्रोक्तं; E : एवं तज्जातिकं प्रोक्तं
134. A, B, C : समन्वितः
135. D : संयुतम्
136. D : भवेदेव विनिश्चयः

82-83 The roof of corner aediculae is square, octagonal or circular plan or is sixteen sided and it has a finial; at the centre is a niche; it has *ardhakoṭi*[27] and a pediment and is surmounted by a pole.

84-85 An elongated aedicula has several finials and it is in the middle. Shaped in the back like an elephant's back but in front like the gable frontage of a wagon-roof building, intermediate aediculae are to be placed by the wise between square and elongated aediculae. Or else, the side facade (of an intermediate aedicula?) may be decorated with an elephant's trunk (?).[28]

86-89 This is the disposition that corresponds to the *jāti* mode.[29] If there are elongated aediculae at the corners and a square one in the middle between these, a decoration consisting of small elongated aediculae and other similar elements, this is *chanda* mode. When either the square aediculae or the elongated ones are on a stereobate and, consequently, some are higher than others, this is *vikalpa* mode. The *ābhāsa* mode can be identified when these two arrangements are employed together and is suitable for very small buildings, small, medium and large ones.[30] An edifice envisaged along the lines of any of these systems, the first being *jāti,* guarantees success whilst the transgression of any of these rules will bring about certain death.

27. *Ardhakoṭi*: the precise nature of that feature is not clear. Elsewhere it is mentioned in relation with wagon roofs (see 24.90, 96, 99), which agrees with what we have here: the false dormer window which tops the protruding 'porch' of the aedicula is like a wagon roof gable. If taken literally its name would signify something like 'half curved end'; however *koṭilupā* designates a 'corner rafter' (18.30b-31a, and note *ad loc.*) and that term appears sometimes in the shortened form *koṭi* (25.218 and note *ad loc.*); thus *ardhakoṭi* may represent an element of the timber work of a wagon roof gable (or naturally, as it is the case here, the same element used as a decorative feature).

28. Cf. above v. 70.

29. *Jāti, chanda, vikalpa* and *ābhāsa* are classificatory terms applied as well to pavilions (25.170 sq.), halls (25.228), houses (26.37 sq., 68 sq.) or methods to cut out a liṅga (33.65); as usual *jāti* designates here the 'normal' category.

30. Thus the *ābhāsa* mode corresponds to temples where the stereobate runs below *kūṭa* and *koṣṭha.*

षडष्टाश्रे च वृत्ते च द्व्यश्रवृत्ते च तत् क्रमात् ।
पञ्चाष्टनवपङ्क्त्यंशे व्यासैकांशेन बाह्यतः[137] ॥ ९० ॥
[138]वर्तयेत् तु तदाकृत्या कोटिच्छेदार्थमीरितम् ।
चतुरश्रस्य [139]नाहेन योजयेत् तु समं यथा ॥ ९१ ॥
तया वर्तनया तेषां मानं संपूर्णमिष्यते ।
मानं धाम्नस्तु संपूर्णं जगत्संपूर्णता भवेत् ॥ ९२ ॥
[140]तस्मात् सर्वप्रयत्नेन कुर्यात् संलक्ष्य बुद्धिमान् ।
एवं संक्षेपतः प्रोक्तं प्रासादानां तु लक्षणम् ॥ ९३ ॥
[141]एकादिद्वादशान्तं ह्युदयविपुलभागं करैस्तारमानं
चोत्सेधं कूटकोष्ठाद्यवयवकरणं नाहभेदं क्रमेण ।
प्रोक्तं संक्षिप्य [142]सम्यङ् मुनिभिरवितथैर्ब्रह्मपूर्वैर्यथोक्तं
नानाभेदैर्विमानं प्रियतरमनघं तैतलानां मयेन[143] ॥ ९४ ॥

इति मयमते वस्तुशास्त्रे चतुर्भूम्यादिबहुभूमिविधानो नाम
द्वाविंशोऽध्यायः

137. E : सन्धयेत्
138. F : omits 91a; E : बाह्यं तद्वर्द्धयेत्तद्वत्
139. C : नाभेन
140. F : omits 93a.
141. F : omits 94a.
142. C : वक्ष्ये for सम्यङ्
143. A (var), C : मयेह; F : मये बहु

90-92a According to whether (the aedicula) is hexagonal or octagonal or comprises an apse, an eighth, ninth or tenth of its width must be added to the exterior... (?).[31]

92b-93a If the dimensions of the house are in whole numbers, the earth will be very abundant (in riches),[32] that is why the sage must draw everything with the greatest of care.

93b-94 Thus have the characteristics of temples been laid out in succession; next indicated are the dimensions, in cubits, and the proportions of the height and width of buildings of from one to twelve storeys; the arrangements of elements such as aediculae have been indicated as well as names and types (of temples). Maya has accurately made statement of all that has been prescribed by the great seers, of whom the premier is Brahmā, for the construction of temples of various kinds, perfect and without flaw.

Thus ends, in the *Mayamata*, treatise on dwelling,
the twenty-second chapter : RULES FOR
TEMPLES WITH SEVERAL STOREYS
STARTING WITH THOSE WITH
FOUR STOREYS.

31. That passage seems to deal with the drawing of some architectural element (perhaps in relation with the roofing of aediculae).
32. Literally 'When measurements of a house are full, world is full'.

अथ त्रयोविंशोऽध्यायः[1]

प्राकारपरिवारविधानम्

[तत्र प्राकारविधानम्]

[2]रक्षार्थं च[3] विमानानां शोभार्थं च तथाऽधुना ।
परिवारनिवेशार्थं प्राकारं प्रोच्यते बुधैः ॥ १ ॥

[प्राकारमानम्]

कृत्वा चतुष्पदं मूलप्रासादस्य तु विस्तृतम्[4] ।
आद्यं सालं महापीठं [5]पदैः षोडशभिर्युतम् ॥ २ ॥
मण्डूकाख्यं द्वितीयं स्यान्मध्यं [6]भद्रमहासनम् ।
चतुर्थं सुप्रतीकान्तं पञ्चमं चेन्द्रकान्तकम् ॥ ३ ॥
एवं युग्मपदैर्युक्तमयुग्मैरथ[7] वक्ष्यते ।
[8]एकमाद्यं विमानं स्यादाद्यं सालं तु पीठकम् ॥ ४ ॥
[9]द्वितीयं स्थण्डिलं [10]सालं मध्यं चोभयचण्डितम् ।
सुसंहितं चतुर्थं स्यादीशकान्तं तु पञ्चमम् ॥ ५ ॥

1. F : omits verses 1 to 10b.
2. G : omits verses 1 to 3
3. C : सरक्षार्थं
4. E : विस्तरम्
5. D : पदे
6. E : भद्रे
7. E : मध्यमैरथ instead of अयुग्मैरथ
8. E : एवमाद्यं
9. D : omits 5a.
10. C : समं; G : स्थलं

CHAPTER 23

ENCLOSURES AND ATTENDANTS' SHRINES[1]

Enclosures[2]

1 Now the sanctuary enclosures are prescribed just as they have been given by the experts. They are intended to protect and embellish the temple and to contain the Attendants' shrines as well.

Dimensions of enclosures

2-3 (The diagram for) the main temple is drawn up with four squares:[3] that for the first enclosure is the *mahāpīṭha* consisting of sixteen squares, that for the second is the *maṇḍūka* (64 squares), that for the median enclosure, the *bhadramahāsana* (136 squares), that for the fourth enclosure, the *supratīkānta* (484 squares) and that for the fifth the *indrakānta* (1024 squares).

4-5 This is the procedure with diagrams which are even; now that for those which are odd is given. The (main) temple occupies only one square; the diagram for the first enclosure is the *pīṭha* (9 squares), that for the second is the *sthaṇḍila* (49 squares), that for the median one the

1. This chapter deals with concentric enclosures of the temple (vv.1-34), then with Attendant deities' shrines and other buildings located in those enclosures (vv. 35-106), and it ends with a description of the statue of Vṛṣa, Śiva's main Attendant.
2. *Prākāra*: the term designates enclosure walls as well as corresponding courtyards (which are also called *aṅkaṇa/aṅgaṇa*). Cf. Dagens 1984 (pp.134-38) based on *Ajita* (chapter 38) and *Raurava* (Kriyā. chapter 41); the description given in *Mayamata* which is followed by *Īśānaśiva* (Kriyā. 35.44 sq.), is shorter than what is found in *Mānasāra* (chapter 31) or *Śilparatna* (chapter 40). General rules given here for temples' enclosures, may be applied as well to palaces' enclosures (see below 29.30 sq.); thus, keeping in mind the ambiguity of both terms *vimāna* and *parivāra*, one may translate the first verse: "Now the building enclosures are prescribed. . . They are intended. . . to contain the houses of the attendants (of the god or of the king)".
3. The ensemble comprising the temple and its enclosures is arranged according to a set of concentric diagrams; for the sake of clarity we add between brackets the number of squares which each of them comprises (see above chapter 7 passim).

चतुरश्रीकृते तेन मुखायाममिहोर्ध्वतः[11] ।
पादाधिकमथाध्यर्धं पादोनद्विगुणं क्रमात्[12] ॥ ६ ॥
द्विगुणं [13]द्विगुणार्धं च त्रिगुणं वा चतुर्गुणम् ।
मुखायाममिति प्रोक्तं प्राकाराणां विशेषतः ॥ ७ ॥
क्षुद्राणामल्पहर्म्याणां स्वव्यासार्धप्रमाणतः ।
अन्तर्मण्डलकं कुर्यात् सत्रिहस्तं तु तत्समम् ॥ ८ ॥
द्वितीयं हि तृतीयं तु तस्मात् पञ्चकराधिकम् ।
तस्मात् [14]ससप्तहस्तं [15]तु तत्समं स्याच्चतुर्थकम् ॥ ९ ॥
[16]नवहस्तसमायुक्तं तत्समं पञ्चमं भवेत् ।
[17]मध्यमानां स्वतारार्धमन्तर्मण्डलमिष्यते ॥ १० ॥
तत्समं पञ्चहस्तेन संयुक्तं स्याद् द्वितीयकम्[18] ।
सप्तहस्ताधिकं तस्मात् सालमुक्तं तृतीयकम् ॥ ११ ॥
[19]नवहस्ताधिकं तस्माच्चतुर्थं सालमीरितम् ।
[20]एकादशकरैर्युक्तं तत्समं पञ्चमं भवेत् ॥ १२ ॥
उत्तमानां स्वतारार्धमाद्यं सालं प्रकीर्तितम्[21] ।
तत्समं सप्तहस्तेन संयुक्तं स्याद् द्वितीयकम् ॥ १३ ॥
नवहस्ताधिकं तस्माद् तृतीयं सालमुच्यते[22] ।
तस्मादेकादशाधिक्यं तत्समं तु चतुर्थकम् ॥ १४ ॥
त्रयोदशकरैर्युक्तं तत्समं पञ्चमं भवेत्[23] ।
एवं क्षुद्राल्पमध्यानामुत्कृष्टानां प्रकीर्तितम्[24] ॥ १५ ॥

11. A (var), C, D : इतोर्ध्वतः; E : इतोच्यते
12. D, G : तु वा for क्रमात्
13. D : त्रि-
14. E : सप्तद्विहस्तं
15. G : तत्
16. G : omits verse 10.
17. D : अल्पमानां
18. E : द्वितीयके
19. E : नवमं सप्तहस्तेन संयुक्तं स्याद् द्वितीयकम्
20. G : omits 12a.
21. G : प्रवक्ष्यते
22. E : समुदीरितम्
23. E : पादं तत्समपञ्चकम्
24. C : यथा क्रमम्; G : प्रशस्यते

ubhayacaṇḍita (169 squares), that for the fourth the *susaṃhita* (441 squares) and that for the fifth the *īśakānta* (961 squares).

6-7 On the quadrangular area thus obtained, the length of the front facade is to be calculated as has been given above. It is one and a half, one and three quarters, twice, two and a half, three or four times (the width of the temple). In this way the front length of each enclosure is calculated.[4]

8-10a Where the smallest of small temples are concerned, the *antarmaṇḍala*[5] is built at a distance (from the temple) of one and a half times the (temple's) width and the second enclosure at the same distance, augmented by three cubits; the third is five cubits farther than that, the fourth seven cubits beyond (the third) and the fifth nine beyond (the fourth).

10b-12 For the medium category of (small sized) temples the *antarmaṇḍala* is built at a distance equal to half their width, the second enclosure is five cubits farther, the third seven more than that, the fourth nine, and the fifth eleven more.

13-15a For the superior class (of small sized temples) the first enclosure is at a distance equal to half the temple's width, the second is seven cubits farther, the third nine and, beyond that, the fourth is eleven more cubits away and the fifth thirteen more.

15b-16 These are the prescriptions for small sized buildings of low, medium or high category; it is according either to this method or to that

4. *Mukhāyama*: temple enclosures are square or oblong in plan, thus their 'front length' (or 'main dimension') is their width. The width of the temple is used as a reference unit to indicate the proportions of enclosures; some treatises designate it as a 'module' (*daṇḍa*): see e.g. *Ajita* (cf. Dagens 1984 p.15) or *Suprabhedāgama* (Kriyā. 31.116).

5. *Antarmaṇḍala* is the first enclosure (starting from the centre); *Mayamata* does not give the full set of terms which respectively designate each of the five enclosures that may comprise a sanctuary; they generally are (cf. Dagens 1984 p.134:) *antarmaṇḍala* (1st enclosure), *antarhāra* (2nd), *madhyahāra* (3rd), *maryāda* or *maryādi* (4th), and *mahāmaryāda* or *mahāmaryādi* (5th); *Śilparatna* (40.2-3), however, uses *bahyahāra* for the fourth enclosure and *maryāda* for the fifth. In descriptions of palaces, *maryādi* is the word which designates the outer enclosure (see chapter 29 v. 19). specific gateways with specific names correspond to each of the five enclosures (see 24.2-3).

[25]एतेन कारयेद् धीमान् पूर्वोक्तेन क्रमेण वा[26] ।
[27]प्राकारं परितस्तस्मान्मुखायामं तु पूर्ववत् ॥ १६ ॥
भित्त्यभ्यन्तरमानेन मानयेन्मानवित्तमः ।
भित्तिमध्येन [28]बाह्येन कैश्चिदुक्तं तु सूरिभिः ॥ १७ ॥

[प्राकारभित्तिः]

अन्तर्मण्डलभित्तेश्च विष्कम्भं सार्धहस्तकम् ।
तस्माद् त्रित्र्यङ्गुलाधिक्याद् द्विहस्तान्तं यथाक्रमम् ॥ १८ ॥
पञ्चानामपि सालानां विष्कम्भं परिगृह्यताम् ।
[29]तत्तद्विष्कम्भमानेन त्रिगुणं वा चतुर्गुणम् ॥ १९ ॥
प्राकारोदयमुद्दिष्टं[30] स्वाष्टांशोनाग्रविस्तरम् ।
[31]उत्तरान्तोचिता[32] वाऽपि कुम्भमण्ड्यन्तकोदयाः ॥ २० ॥
[33]मसूरकादिवर्गाढ्याः खण्डहर्म्याभिमण्डिताः[34] ।
ऋजुभित्तियुता वाऽपि बुद्बुदार्धेन्दुशीर्षकाः ॥ २१ ॥
[35]क्षुद्राल्पानां तु सालानां भित्तिर्हस्तप्रमाणतः ।
सार्धहस्तावधिर्यावत् [36]पूर्ववद् [37]वर्धयेत् क्रमात् ॥ २२ ॥
सोत्तरा वाजनच्छत्र[38]शीर्षाभाः सालभित्तयः[39] ।
[40]भित्तिव्याससमोत्तुङ्गं पादार्धाधिकमेव वा ॥ २३ ॥
तदुच्चे रुद्रभागेऽप्यग्निमोक्षोऽक्षिशिवांशकैः ।
[41]उत्तरं वाजनाब्जं च क्षेपणं च यथाक्रमम् ॥ २४ ॥

25. E : एकेन
26. G : तु
27. E : प्रोक्तारं
28. E : मध्ये तु
29. G : उक्त-
30. D : उत्कृष्टं
31. G : omits 20b.
32. D : उत्तरान्ताश्रितो
33. E : मसूरकादिवर्गाभ्यां
34. G : आदिमण्डितः
35. G : omits 22a.
36. D : पृष्ठवद्
37. E : दृघयेद्
38. A (var), C : शीर्षायाम्; G : शीर्षाकाम्
39. D et E : भित्तिका
40. D : omits 23b-32a; E : omits 23b-25a.
41. A (var), C : उत्तरे

previously indicated, that the sage is to establish the surrounding enclosures and is to calculate, as above, the length of their front facade.

17 The expert on measurements takes the dimensions from the interior face of the walls; some specialists, however, prescribe that they be taken from the middle (of their thickness) or from their exterior face.[6]

Enclosure walls

18-20a. The thickness of the *antarmaṇḍala* wall is a cubit and a half; (for the other enclosures) three digits are added to this figure (per enclosure), up to two cubits; thus is the thickness of the five enclosure walls determined. The height of each wall is three or four times its thickness and the thickness at the top is seven eighths (that at the bottom).[7]

20b-21 The walls are elevated up to the height of the architrave, the bell-capital or the abacus (of the pillars of the main temple). They are provided with various elements such as a base[8] and are decorated with flanking structures[9] or they are bare; their top has rounded or semi-circular merlons (?).

22 Measured in cubits, the thickness of the enclosure walls of the smallest temple goes from one cubit to one and a half by the same increase as given above (i.e. by three digits).

23-25 The coping of the enclosure wall comprises an architrave, an upper fascia and a cap-stone; its height is equal to the width of the wall or to that width augmented by a quarter or by a half; this height is divided into eleven parts: three for the architrave, three[10] for the fascia, two for a

6. That is to say that the reference line (*mānasūtra*) of an enclosure can follow its interior or external face or the middle of its thickness. Cf. *Ajita* 38.18:

मानसूत्राद् बहिर्भित्तिरन्तर्वापि प्रकल्पयेत् ।
भित्तिमध्यगतं वाथ मानसूत्रं प्रकल्पयेत् ॥

7. Temple walls are less thick than those of forts (cf. 10.15-16a).
8. *Masūrakādivarga*: the wall is described as would be a building with a base at the bottom, a kind of level of pillars and at the top an entablature (see below *uttara*, *vājana*) crowned by a copstone which is like a roof...
9. *Khaṇḍaharmya*: the *Kāraṇāgama* (1.8.22a) calls them *baddhaharmya* ('bound building'); they may be used as Attendants' shrines (below note 24), as is seen at the Kailāsanātha Temple at Kancipuram, for instance.
10. *Mokṣa*: 'three', for according to Sāṅkhya, there are three bonds (*bandha*) and the liberation is thus to be threefold.

ऋजुभित्तियुतं ह्येतत् खण्डहर्म्याभिमण्डितम्[42] ।
अधिष्ठानादिवर्गाढ्यं निर्गमोद्गमसंयुतम् ॥ २५ ॥

[आवृतमण्डपम्]

[43]एकद्वित्रितलोपेतं कुर्यादावृतमण्डपम् ।
अभ्यन्तरे बहिष्ठात् तु ऋजुभित्तियुता भवेत् ॥ २६ ॥
[44]अधोभूमित्रिभागे तु द्विभागं चोर्ध्वभूमिकम् ।
तत्पादाष्टांशहीनं वा बहिर्भित्त्युन्नतं भवेत् ॥ २७ ॥
मालिकाकृतिरेवं वा [45]महावारयुतं तु वा ।
[46]मानान्तं बाह्यभित्त्युच्चमधो भूमेः स्थलान्तकम् ॥ २८ ॥
मूलसद्मोत्तरान्तं वा प्रस्तरान्तमथापि वा ।
खण्डहर्म्योत्तरान्तं वा शिखरान्तोन्नतं तु वा ॥ २९ ॥
मण्डपं द्वितलं वैकतलं वाऽपि तदावृतम् ।
अधिष्ठानादिवर्गाढ्यं [47]समं वाष्टांशहीनकम् ॥ ३० ॥
त्रिपादं [48]वा विशेषेण सालाधिष्ठानतुङ्गता ।
द्विगुणं चरणोत्तुङ्गं षडष्टांशोनमेव वा ॥ ३१ ॥

[सालशीर्षालङ्कारः]

[49]उक्षं वा भूतरूपं वा कर्तव्यं सालशीर्षके ।
मूलजन्मतलं हस्तमात्रोच्चं जन्मसालतः[50] ॥ ३२ ॥

42. G : आदिशोभितम्
43. G : omits 26a.
44. C : अधोभूमिं
45. D : मञ्चैर्युतं
46. D : मानं तद्
47. D : समुपस्तांशहीनकम्; G : समं षाष्टांशहीनकम्
48. D : वा विधीयेत; G : वापि शेषाणां
49. D : उक्षवाहनरूपा
50. E : तु ससालतः

doucine and three for the cap-stone. The wall (on its exterior face) may be bare or it may have flanking structures (on its interior face); these comprise (all necessary elements), beginning with a base, and their projection is (equal to) their height.

Cloister-like gallery[11]

26-28a (Or else) a cloister-like gallery with one, two or three storeys, may be arranged on the interior face of the wall, the exterior face being bare. The height of the top storey (of this gallery) may be two thirds of its ground floor or it may be three quarters or seven eighths of it, or the height (of the gallery) is the same as that of the wall on its exterior face. This gallery may be *mālikā*-shaped or may have a long verandah.[12]

28b-29 The greatest heights (that may be attained) by the exterior walls are the following: that of the floor of the bottom storey of the main temple, that of its architrave, of its engaged structures or of its roof.[13]

30-31 A gallery with one or two storeys may be built all around; it is provided with a base (etc. . . .) whose height is equal to the base of the wall or is three quarters or six eighths of it; the height of the pillars of this gallery is double (that of its base) or may be (double) less a sixth or an eighth.

Decoration of wall coping

32a Images of bulls and dwarves should be arranged on the coping of the wall.[14]

11. *Āvṛtamaṇḍapa*: *maṇḍapa* is used here in its general meaning of 'hypostyle structure' (see chapter 25 notes 1 and 66); such cloister-like galleries often demarcated by partition walls are used to house temple annexes such as oblation place, etc. (see the list given below vv. 83b sq.) as well as Attendant shrines.
12. *Mālikā* are rows a buildings making up galleries with one or several storeys (see below v. 59 and note *ad loc.*); *mahāvāra*: a *vāra* may be an inner court (covered or not covered) as well as a verandah leaning to a main building (see chapter 26 and Introduction). The meaning is that an *āvṛtamaṇḍapa* may be either a single- or multi-storeyed independent construction built against the enclosure wall or a verandah leaning to it.
13. The finial not being mentioned here, it seems that the height of the enclosure walls must be less than that of the temple.
14. Bulls and dwarf-like *gāṇa* are specific to Śiva's temples; for other gods the statues on the top of the walls are their specific mounts (as it is the case for images placed around the attic of the temple).

[अधिष्ठानोत्सेधः]

[51]प्रतिसालं तु षण्मात्रहीनं स्याच्छेषसालके[52] ।
क्षुद्रे साष्टादशाङ्गुल्यं मध्यमे मूलपादुकम्[53] ॥ ३३ ॥
क्षपयेत् तु चतुमत्रैर्यावत् पञ्चान्तसालकम् ।
योजयेद् [54]विधिनानेन स्थपतिस्तत्क्रमेण तु ॥ ३४ ॥

[परिवारालयविधानम्]

परिवारविमानानां मानं गर्भार्धमिष्यते[55] ।
मूलवस्तुत्रिभागैकं मध्यं वा पादबाह्यकम् ॥ ३५ ॥
त्रिचतुष्पञ्चषट्सप्तहस्तैर्वा हर्म्यविस्तृतम् ।
अष्टौ वा परिवाराः स्युस्तथा द्वादश षोडश ॥ ३६ ॥
द्वात्रिंशत् परिवाराश्च [56]हीष्यन्ते शास्त्रकोविदैः[57] ।
[58]परिवारामरोत्सेधं युक्त्या तत्रैव योजयेत् ॥ ३७ ॥
यदुक्तं [59]सकले बेरे तन्मानं गृह्यतां वरैः ।
सर्वलक्षण[60]संयुक्तं स्थानकासनमेव वा ॥ ३८ ॥

[अष्टौ परिवाराः]

[61]हीनविमानानामथ परिवाराश्चाष्ट वै प्रोक्ताः ।
प्राकारोऽप्येकः[62] स्यात् पीठपदे चार्यकादिषु[63] वा ॥ ३९ ॥

51. E : प्रतिमानं
52. A (var), D and E add between 33a and 33b :
हस्तार्धं वापि जन्तोच्चं तस्मात् त्रिःयङ्गुलक्षयम् ।
महामर्यादिभित्त्यन्तमेवं युञ्जियात् बुद्धिमान् ॥
53. G: मूलपादकम्
54. D : विधिना तेन
55. D, E : एव वा for इष्यते
56. D : विष्यन्ते
57. G : वास्तुकविदैः
58. D : परिवारामधोत्सेधं
59. D : सकलं बेरं
60. E : संपन्नं instead of संयुक्तं
61. D : भीतमानं परिवारा त्राक(?)दीनाश्चाष्ट वै प्रोक्ता
62. A (var), C : एवं instead of एकः
63. All the texts (less E) : चार्यकः स्थाप्यः

Height of bases

32b-34 The base of the central (temple) exceeds by one cubit (that) of the first enclosure; with the other enclosures this difference diminishes by six digits for each one; this is suitable for a small temple and, for a medium one (the difference) is eighteen digits, diminishing by four digits for each enclosure up to the fifth. The architect should proceed in this way, according to this progression.

Attendants' shrines[15]

35-36a The sanctum of an Attendant's shrine takes up half its width, which width is a third, a half or three quarters that of the main temple; it is also said that the width of these edifices is three, four, five, six or seven cubits.

36b-38 According to the sages well acquainted with the treatises, there are eight, twelve, sixteen or thirty-two Attendants. The (heights) (of the images) of the Attendants placed in these shrines are to be determined according to rule; the well advised one will choose dimensions as prescribed for a manifest image;[16] endowed with all their distinctive signs, these images may be standing or seated.

The eight Attendants

39-40a When the sanctuary is small, there are eight Attendants and a single enclosure; if it follows the *pīṭha* diagram, they are placed starting on

15. *Parivārālaya*: the Attendants' shrines are chapels; they may be similar to the temple itself (with a six-level elevation) or to various types of building (see below v. 57b-58a); however Attendants also may be housed in less specific constructions (galleries and the like) or even their images may be installed in the courtyard, or substituted by altars. Cf. Dagens 1984 (pp.142 sq., based on *Ajita* chapter 39, and *Raurava* Kriyā chapter 33), *Mānasāra* (chapter 32), *Īśānaśiva* (Kriyā. 35.56 sq.), *Suprabhedāgama* (Kriyā. chapter 39). List of Śiva's Attendants is followed by a very short one for Viṣṇu's. *Mayamata* limits the use of '*parivāra*' to the designation of the *parivāradevatā* (or their shrines), while some other texts give to the term a wider meaning, applying it altogether to several annexes of the temple (cf. *Suprabhedāgama* Kriyā. 39.1b:

द्वारपालादिपीठान्तं परिवारमिति स्मृतम् ॥

16. *Sakala*: the manifest (or iconic) representation of a god, as opposed to its 'unmanifest' (*niṣkala*) or symbolic representation (see below 33.1).

[64]ऋषभगणाधिपकमलजा मातृ[65]गुहार्याच्युताश्च चण्डेशः ।

[द्वादश परिवाराः]

उपपीठपदे चान्तर्द्वादश परिवारकाः स्थाप्याः ॥ ४० ॥
[66]वृषकमलजगुहहरयः पूर्ववदुदितास्तथार्यकादिपदे ।
रविगजवदनयमास्ते मातृजलेशौ च दुर्गा च ॥ ४१ ॥
धनदश्चण्डः क्रमशः सूर्यपदादिष्ववामगताः ।

[षोडश परिवाराः]

षोडश परिवाराः स्युश्चोग्रे पीठे निधातव्याः ॥ ४२ ॥
अन्तश्चार्यक[67]भागादिषु वृषभाद्यास्तथा प्राग्वत् ।
ईशपदे च जयन्ते [68]भृशभागेऽग्नौ च वितथे च[69] ॥ ४३ ॥
भृङ्गनृपे पितृसुगले शोषे वायौ च मुख्यकेऽप्युदितौ ।
[70]चण्डश्चन्द्रः सूर्यो गजवदनः श्रीः सरस्वती चेति ॥ ४४ ॥
[71]ता मातरश्च शुक्रो जीवो दुर्गा दितिस्तथाप्युदितिः ।

[द्वात्रिंशत् परिवाराः]

[72]द्वात्रिंशत् परिवाराः स्थण्डिलकाख्ये तु चण्डिते स्थाप्याः ॥ ४५ ॥॥
ब्रह्मपदं नवबाह्यो श्रीज्येष्ठोमा सरस्वती चैताः[73] ।
[74]साविन्द्रेन्द्रजयांशे रुद्रजये चापवत्से च ॥ ४६ ॥
आर्यादिषु च पदेषु वृषभाद्याः पूर्ववत् कथिताः ।
[75]ईशे पर्जन्यपदे माहेन्द्रे भानुभागे तु ॥ ४७ ॥

64. G : omits 40a.
65. D : गुहज्येष्ठाच्युताश्च
66. E : वृषभगृहार्याहर्यः
67. D : भङ्गादिषु
68. D : प्रभाग्नेऽग्नौ; G : भूमिभागेऽग्नौ ।
69. C : विघते च; E : वायुवितढौ
70. C : चन्द्रश्चण्डः; D : चण्डेशचन्द्र-; E : चन्द्रं चण्डक-
71. D : दामोदरस्थ्यक्रो
72. D : वरदिनकरत्रिंशत् परिवारासु स्थण्डिलकाख्यं तु ।
73. D : वेदा
74. E : सावित्रीन्द्र-; G : सावित्रेन्द्र-
75. C : ईश-

Āryaka's square, (in the following order): Ṛṣabha, Gaṇādhipa, Kamalaja, the Mothers, Guha, Ārya, Acyuta and Caṇḍeśa.[17]

The twelve Attendants

40b-42a If the diagram is *upapīṭha*,[18] the Attendants to be put there are twelve: in the first place there are Vṛṣa, Kamalaja, Guha and Hari who are arranged as above beginning at Āryaka's square and, in the second place, Ravi, Gajavadana, Yama, the Mothers, Jaleśa, Durgā, Dhanada and Caṇḍa who are installed from the square of Sūrya and going round to the right.

The sixteen Attendants

42b-45a If the diagram is *ugrapīṭha*,[19] sixteen Attendants are installed. Vṛṣabha and the others are inside as in the preceding case, on the squares of Ārya etc. . . . Then follow Caṇḍa at Īśa's square, Candra at Jayanta's, Sūrya at Bhṛśa's, Gajavadana at Agni's, Śrī at Vitatha's, Sarasvatī at Bhṛṅganṛpa's, the Mothers at Pitṛ's, Śukra at Sugala's, Jīva at Śoṣa's, Durgā at Vāyu's, Diti at Mukhya's and Uditi at Uditi's.

The thirty-two Attendants (fig.17)

45b-52 If the diagram is the one named *sthaṇḍila*, thirty-two Attendants are installed;[20] around the nine squares of Brahmā's place are these

17. *Pīṭha* diagram (with nine squares) is the one of the first enclosure (above v. 4b); the list of *vāstudevatā* given for that diagram in chapter 7 (v. 24 and Fig.2) does not agree with the one suggested here by the expression *āryakādiṣu*; that last seems to correspond to the eight *vāstudevatā* which occupy the inner squares (surrounding Brahmā's one) of *upapīṭha* twenty-five square diagram (cf. Fig. 4). Attendants' shrines are located with reference to the gods of the diagram but there is not any relation between the *vāstudevatā* which is the Lord of a square and the Attendant whom the shrine is located on that square; thus Vṛśabha is installed on Ārya square but Ārya is on Rudraja's.
18. The *upapīṭha* diagram (25 squares) has not been mentioned for the arrangement of enclosures; the Attendants are placed in two concentric rows respectively corresponding to the inner and outer squares of the diagram (see Fig. 12); we do not know if the two row arrangement corresponds to a single or a multiple enclosure disposition. The twelve Attendant list is rarely mentioned.
19. The *ugrapīṭha* diagram (36 squares) has not been mentioned for the arrangement of enclosures; like in the previous case, there are two concentric rows of Attendants, but nothing indicates the number of enclosures (but see below vv. 53b-54a).
20. *Sthaṇḍila* diagram (49 squares) is used for the second enclosure; Attendants are placed in three rows and, here again, no indication is given on the number of enclosures.

सत्यान्तरिक्षकानलपूष[76] गृहक्षतार्किभागे तु ।
गन्धर्वे [77]मृषभागे पितृबोधनपुष्पदन्तवरुणेषु ॥ ४८ ॥
[78]असुरे यक्षसमीरणभागे नागे च भल्लाटे ।
सोमपदे [79]मृगभागेऽप्युदितौ[80] देवाः क्रमात् स्थाप्याः ॥ ४९ ॥
ईशशशिनन्दिकेश्वरसुरपतयो[81] वै महाकालः ।
दिनकरवह्निबृहस्पतिगजवदनयमाश्च भिङ्गिरिटिः[82] ॥ ५० ॥
चामुण्डाप्यथ निर्ऋतिश्चागस्त्यो विश्वकर्मा च ।
जलपतिरथ भृगुनामा दक्षः प्रजापतिर्वायुः ॥ ५१ ॥
दुर्गा च वीरभद्रो धनदश्चण्डेश्वरः शुक्रः ।
स्थण्डिलचण्डितभागे पण्डितजनमण्डलैरुदिताः ॥ ५२ ॥
युग्मायुग्मपदे ते [83]कुड्यगता वागताश्च पदमध्ये ।
[84]त्रिप्राकारे पञ्चप्राकारेऽप्येवमेव भवेत् ॥ ५३ ॥
[85]अष्टाद्याः परिवारा मध्यान्तर्हारयोरुदिताः ।
[86]प्रत्यग्दिङ्मुखहर्म्ये मित्रे वृषभस्थितिः प्रोक्ता ॥ ५४ ॥

76. A, C, D, E, G : ग्रहक्षतार्तिभागे
77. A, C, G : भृषभागे
78. D : द्वार instead of असुरे
79. A, C, G : ऋभभागे; D : मृषभागे
80. C : उदिता
81. D : पतिधो
82. C : भृङ्गिरिति; D : भागिरथी
83. E, G : कुड्ययुता
84. G : omits 53b.
85. E : omits 54a.
86. E : प्रत्यङ्मुखे भवेद्धर्म्ये

divinities: in the first place Śrī at Sāvindra's square, Jyeṣṭhā at Indrajaya's, Umā at Rudrajaya's and Sarasvatī at Āpavatsa's; in the second place, Vṛṣabha and the others at Āryaka's square . . . etc. as in the preceding case; then Īśa is installed at Īśa's square, Śaśī at Parjanya's, Nandikeśvara[21] at Mahendra's, Surapati at Bhānu's, Mahākāla at Satya's, Dinakara at Antarikṣa's, Vahni at Anala's, Bṛhaspati at Pūṣan's, Gajavadana at Gṛhakṣata's, Yama at Ārkin's, Bhṛṅgiriṭi at Gandharva's, Cāmuṇḍā at Mṛṣa's, Nirṛti at Pitṛ's, Agastya at Bodhana's,[22] Viśvakarman at Puṣpadanta's, Jalapati at Varuṇa's, Sage Bhṛgu at Asura's, Prajāpati at Yakṣa's,[23] Vāyu at Samīraṇa's, Durgā at Nāga's, Vīrabhadra at Ballāṭa's, Dhanada at Soma's, Caṇḍeśvara at Mṛga's, and Śukra at Uditi's. This is the arrangement on the *sthaṇḍila* diagram, according to the consensus of the learned.

53a According to whether the diagrams are even or odd, Attendants' shrines are built up against the wall of the enclosure or are detached and installed in the middle of the diagram's squares.[24]

53b-54a Where there are three or five enclosures, the arrangement is as above: the first eight Attendants are to be found, (according to circumstances), in the *antarhāra* or in the *madhyahāra*.[25]

21. Nandikeśvara and Mahākāla, the main *dvārapāla* of Śiva's temple, are on both sides of the oriental entrance.
22. Bodhana has not been mentioned amongst the *vāstudevatā* in chapter 7; the name is that of planet Mercury; in the present case it may designate either Dauvārika or Sugrīva.
23. Yakṣa may correspond to Roga or Śoṣa.
24. When the shrines are built against the wall (*kuḍyagata*) they are like *khaṇḍaharmya* (see above note 9), unless they are housed in a cloister like gallery (cf. note 11 and below vv. 71b-72a). That passage may explain why diagrams indicated for the location of Attendants are not same as those used for the arrangement of enclosures.
25. That seems to mean that there are no Attendants' shrines in the first enclosure of a three enclosure sanctuary, and neither in the first or second enclosure when it is a five-enclosure arrangement; see however vv. 93-94a.

कमलजगुहहरयस्ते भूधरभागार्ययोर्विवस्वति च ।
[87]यन्मुखमीश्वरभवनं तन्मुखमेवोदितं तेषाम् ॥ ५५ ॥
[88]शिष्टा[89] हर्म्याभिमुखाः पूर्वोक्तपदे निधातव्याः ।
[90]प्राक्प्रत्यङ्मुखमुक्षा देवाभिमुखो न वाऽभिमुखः ॥ ५६ ॥
अवागुत्तरदिशि मुखिनौ चण्डेशेभाननौ च मतौ ।
प्रासादमण्डपसभाशालाकाराणि[91] कार्याणि ॥ ५७ ॥
परिवारविमानानि सर्वाण्यङ्गानि युक्तिवशात् ।

[मालिकापङ्क्तिः]

मध्यान्तर्हारयोरेव मालिकापङ्क्तिरिष्यते[92] ॥ ५८ ॥
एकद्वित्रिचतुर्भूमियुक्ता[93] वा पञ्चभूमिका[94] ।
भित्तेरुपरि भित्तिः स्यात् पादः पादोपरि स्मृतः ॥ ५९ ॥
भित्तेरुपरि पादो वा पादोपरि न भित्तिका ।
कूटकोष्ठादियुक्ता वा [95]जालभित्तिरलङ्कृता ॥ ६० ॥
[96]मण्डपाकृतियुक्ता वा शालाकारसभान्विता[97] ।
[98]भक्तिमानं तथा पादायामं संक्षिप्य वक्ष्यते[99] ॥ ६१ ॥

87. D : यज्ञयज्ञकमीश्वरनन्तनन्तमुख (gap) . . . .
88. G : omits 56a.
89. E : शेषं
90. E : प्राजापत्यं मुखमुक्षा
91. C : कार्याणि for काराणि
92. D : मालिकावितिरिष्यते
93. E : युक्त्या
94. A, B, C, D, E : भूमिके
95. A, B, D : जल-; C : जव-
96. D : मण्डलाकृति
97. D : समान्विता
98. D : भित्तिपादं; E : भित्तिमानं
99. E : कथ्यते

54b-56a If the main temple is orientated towards the west, Vṛṣabha is at Mitra's square whilst Kamalaja, Guha and Hari are at those of Bhūdhara, Ārya and Vivasvant respectively;[26] their orientation should be the same as that of the shrine of Īśvara but the others must face the temple from the positions mentioned above.

56b-57a According to whether the temple is orientated towards the east or the west, Vṛṣa either faces Śiva or has his back to him. Lastly it is said that Caṇḍeśa and Ibhānana must be orientated to the south and the north respectively.[27]

57b-58a The shrines of Attendants are to have the appearance of temples, pavilions, halls or houses and are each to be provided with all prescribed elements.[28]

Storeyed galleries

58b-59a In the *madhya(-hāra)* and in the *antarhāra*, a row of storeyed galleries should be built with one, two, three, four or five storeys.[29]

59b-60a A wall should be built above a wall and a pillar above a pillar; pillars may be installed above walls but walls should not be above pillars.[30]

60b-61a (*Mālikā*) have square and elongated aediculae (etc...) or they have latticed walls, they may also resemble pavilions, houses or halls.[31]

26. That is to say that the position of the four Śiva's main Attendants is to be changed: Vṛṣa's shifts from east to west, Hari's from north to south, Guha-Skanda's from west to east and Kamalaja-Brahmā's from north to south. According to *Ajita* (39.22) and *Raurava* (Kriyā. 11.9), the change concerns only Vṛśa and Skanda.
27. As a matter of fact Caṇḍeśa's chapel is always located at the north of the sanctum (near the spout of the gargoyle).
28. The likeness between Attendants' chapels and temples, pavilions, halls or houses concerns elevation or roof form; thus an Attendant shrine may have a six-level elevation like a temple (*prāsāda*), a three-level one and a terrace roof like a pavilion (*maṇḍapa*), or else a four-level elevation and a hipped roof like a hall (*sabhā*, cf. Dagens 1984 p. 128) or a four-level elevation and a wagon roof like a house (*śālā*).
29. *Madhyahāra* and *antarhāra* are the third and the second enclosure respectively. *Mālikā*: cf. 25.35-36a, 173-175a, 194; 26.100; Dagens 1984 p.126. According to the definition given in chapter 26 *mālikā* are rows of buildings of different sorts linked together in order to form a 'garland' (*mālā*); they house Attendants' shrines as well as other temple annexes (below vv. 71-73 and note 38; cf. *Aṃśumatkāśyapa* 42.63-76 quoted in *Ajitāgama* vol. 2, p. 80).
30. Cf. 25.194.
31. Cf. above note 28; the mention of aediculae seems to mean that *mālikā* may resemble *prāsāda Jālahhitti*: cf. 16.64.

[99]मूलधाम्नस्तूत्तरान्तमुपानाद्युन्नतं क्रमात् ।
सप्तभागैः समं [101]कृत्वा द्व्यंशं मसूरकोन्नतम्[102] ॥ ६२ ॥ ।
पादायामं तु पञ्चांशं पादं सर्वाङ्गसंयुतम् ।
अथवा पादमानं तु नवभागैर्विभाजयेत्[103] ॥ ६३ ॥
अधिष्ठानं द्विभागं स्याच्छेषं पादोदयं भवेत् ।
सार्धद्विहस्तमारभ्य षट्षडङ्गुलवर्धनात् ॥ ६४ ॥
षड्ढस्तान्तं समुत्सेधं स्तम्भं त्रिःपञ्चसंख्यया ।
[104]भित्त्यभ्यन्तरतस्तावदेवं तस्या विशालता ॥ ६५ ॥
भक्त्यायामं च तावत् स्यात् क्षुद्रे महति मन्दिरे ।
षडङ्गुलात् समारभ्य [105]वाङ्गुलाङ्गुलवर्धनात् ॥ ६६ ॥
[106]विंशन्मात्रावधिर्यावत् पादविष्कम्भमिष्यते ।
पादोच्चार्धमधिष्ठानं षडष्टांशोनमेव वा ॥ ६७ ॥
[107]पादोदयत्रिभागैकं चतुर्भागैकमेव वा ।
पादबन्धमधिष्ठानं [108]चारुबन्धमथापि वा ॥ ६८ ॥
[109]पादोनमप्यलङ्कारं [110]प्रस्तरस्याप्यलङ्कृतम् ।
पूर्वोक्तेन प्रकारेण युक्त्या तत्रैव योजयेत् ॥ ६९ ॥
[111]खलूरिका मनुष्याणां वासेष्वेवमुदीरिताः ।
[112]प्रथमावरणाद् यावत् त्रिप्राकारान्तमावृतिः ॥ ७० ॥

100. D : मूलधाम्नस्तु पादान्तं
101. G : कृत्वाब्ध्यंशं
102. G : मसूरकोदयम्
103. E : विभाजिते
104. D : देवहर्म्यान्तरस्तावदेवं
105. E : द्व्यङ्गुला-
106. D : विंशन्त्रयावधिर्यावत्
107. E : omits 68a.
108. E : चरुरूपम्
109. D, G : पादानाम्; E : पादायाम्
110. D : प्रस्तरं वाप्य
111. C : खपूरिका
112. D : प्रथमावरणाद्या वा

61b-67a Their proportions are now indicated and the dimensions of their pillars; the distance between the top of the base of the main temple and its architrave[32] being divided into seven equal parts, the base (of the *mālikā*) makes up two parts of the height and the pillars five; the pillars have the full order. Or else, the height of the pillars (of the temple) being divided into nine parts, the base (of the *mālikā*) makes up two parts of that height and the remainder is for the height of its pillars, for which there are fifteen possible heights, from two and a half cubits to six by successive increments of six digits; their diameter is equal to the thickness of the wall and their intercolumniation is in proportion,[33] this being true both for large and small buildings; it is also said that the diameter of the pillars may be from six to twenty digits by successive increments of one digit.

67b-69 The height of the base (of a *mālikā*) is half that of its pillars or is half, less a sixth or an eighth or else it is a third or a quarter the height of the pillars; the base is to be *pādabandha* or *carubandha* type.[34] (A *mālikā*) is ornamented with an entablature, the total height of the elements of which is a quarter less (than that of the base); here the principles given above are to be applied and adapted.

70-71 Annexes[35] built around houses meant for men are like (the *mālikā* around the temple). They are found all around in the first, (second) and third enclosures (of houses); their doors, which are orientated in

32. That is to say the height of the main temple level of pillars.
33. *Bhakti*: 'intercolumniation', see below 25.11 and note *ad loc.*
34. The *pādabandha* base (see 14.19-20 for description) can be interrupted by an entrance (chapter 14 v. 45-46 and notes 27 and 28). *Cārubandha* base is not dealt with in *Mayamata*; cf. *Īśānaśiva* Kriyā. 31.8-9:
सप्तांशैर्जगती षड्भिः कुमुदं चैकमम्बुजम्।
पट्टं च कम्पश्चैकैकं कण्ठोंऽशावब्जमंशतः ॥
द्वौ वाजनं चाब्जमेकमंशाभ्यामूर्ध्वपट्टिकम्।
चारुबन्धमधिष्ठानमिदं संकृतिभेदितम्॥
35. *Khalūrikā* (*khalūri*): see 26.212 sq. (and note *ad loc.*).

यथेष्टदिशि हि द्वारं [113]युक्त्या युक्तं नृणां मतम्।
परिवारविमानानि [114]तत्तदुक्तपदे क्रमात्॥ ७१ ॥
[115]आर्यात् पूर्वोक्तनीत्या[116] तु प्रासादाभिमुखान्यपि[117] ।
[118]नृत्तमण्डपपीठादि परिवाराद् बहिः पुरः[119] ॥ ७२ ॥
[120]स्नानार्थं [121]मण्डपं वाऽपि नृत्तमण्डपमेव वा।
[122]परिवारालयान्तर्वा कर्तव्यं स्वप्रमाणतः ॥ ७३ ॥

[पीठलक्षणम्]

[123]गर्भगृहार्धेन समौ पीठव्यासोच्छ्रयौ मतौ।
एकद्वित्रिकरव्यासोत्सेधं वा बलिविष्टरम्॥ ७४ ॥
[124]गोपुरात् तु बहिः पीठं प्रासादार्धेन निर्गमम्।
तत्समं वा त्रिपादं वा निर्गमं बलिविष्टरम्॥ ७५ ॥
पञ्चानामपि सालानामारात् पैशाचमग्रतः ।
पैशाचपीठप्रासादमध्ये तु बलिविष्टरम्॥ ७६ ॥
[125]पीठोत्सेधे [126]षोडशभागे भागेन जन्मं स्यात्।
जगती चतुरंशेन कुर्यात् कुमुदं त्रिभिर्भागैः ॥ ७७ ॥
भागेनोपरि [127]पट्टं कण्ठं कुर्यात् त्रिभागेन।
[128]एकेनोपरि कम्पं द्व्यंशं स्याद् वाजनं चोर्ध्वे ॥ ७८ ॥

113. E: युक्त्या नृणां समं मता; G: प्रोक्तं युक्त्या नृणां गृहे
114. D: तदुक्तवदिति
115. D, G: कुर्यात्
116. D: रीत्या
117. D: मुखाद्यापि
118. G: omits to 72b-73.
119. C: पुरा
120. D: ज्ञानार्थं
121. E: मण्डपे
122. D: परिवारालयं तस्मात्
123. E: गर्भार्धेन समो पीठ-; G: गर्भगृहार्धेन समोपेतं
124. D: omits 75-76.
125. D: उपपीठोत्सेधे
126. E: त्रिंशतिभागे
127. D: पट्टं कर्णं; E: गर्भं कर्णं
128. E: भागेनोपरि

whichsoever direction desired, are to conform to the principles given for mortals.[36]

71b-72a (In the *mālikā*), the Attendants' shrines are placed each in the prescribed square starting by Ārya's according to the rule given above, but they (all) face the temple.[37]

72b-73 Outside, in front of these shrines, are the pavilion for the dance, the altars, etc. The pavilion for ablutions and that for the dance may also be between these shrines but (built) with their own proportions.[38]

Altars

74-76 The height and width of the two altars[39] are equal to half (the width) of the sanctum of the temple. The *balivistara*, however, may also have a height and width of one, two or three cubits. The (*paiśāca-*) *pīṭha* is exterior to the *gopura* at a distance equal to half (the width) of the temple;[40] the distance between the *baliviṣṭara* (and the gateway) is the same or three quarters that. The *paiśācapīṭha* is exterior to the five enclosures in front (of the temple) and the *baliviṣṭara* is between the *paiśācapīṭha* and the temple.[41]

77-78 The height of the altar[42] is divided into sixteen equal parts: the first plinth makes up one, the second four, the torus three, the listel which comes above one, the dado three and the listel surmounting it one, the fillet two and the crowning fillet one.

36. That is to say that their door is to be slightly off-centre (cf. 19.22 and 30.43).
37. Cf. above vv. 54 sq.
38. In the first case pavilions are placed in the courtyard in front and outside the *mālikā*, while in the second they are included in it.
39. Cf. *Ajita* 39.41-42a where both the altars are called *mahāpīṭha*:
महापीठद्वयं कुर्याद् बाह्याभ्यन्तरयोरपि ।
गोपुरस्याग्रसंस्थस्य चाभ्यन्तरस्य चावधौ ॥
गुणहस्तादि तत्स्थानमथवा तिथिहस्तकम् ।
40. The term *gopura* may designate either any of the temple gateways or that of the fifth (and last) enclosure (see 24.1-3 and note *ad loc.*); here, as shown by v. 76b, it is to be taken in its second meaning. About the use of temple width as a reference unit for arrangement of temple enclosures, see above note 4.
41. As a matter of fact, altar for *bali* offerings is most of the time placed in the first enclosure.
42. Cf. Dagens 1984 p. 140-41 (and *ibid.* table IV).

तदुपरि वाजनमेकं [129]तद्व्यासार्धं त्रिपादमुपरिदलम् ।
[130]पद्मत्रिभागमूर्ध्वे [131]कर्तव्या कर्णिका मध्ये ॥ ७९ ॥
तस्यार्धं कमलोच्चं वार्धोच्चं कर्णिकायास्तु ।
मध्ये भद्रयुतं वाभद्रं वा सोपपीठं वा ॥ ८० ॥
नानाधिष्ठानानामाकृतयो वा यथा तथाप्युक्ताः[132] ।
एवं पीठालङ्कृतमुदितं प्रवरैः पुरातनैर्मुनिभिः ॥ ८१ ॥

[ध्वजस्थानम्]

वृषभस्याग्रतः कुर्यात् प्रासादार्धप्रमाणतः[133] ।
ध्वजस्थानं तदग्रे तु [134]तन्नीत्वा त्रिशिखालयम्[135] ॥ ८२ ॥
एते वृषादयः सर्वे चान्तर्वामे तु गोपुरात्[136] ।

[प्राकाराश्रितस्थानानि]

[137]मर्यादिसालमाश्रित्य पावके हव्यकोष्ठकम्[138] ॥ ८३ ॥
अग्निगोपुरयोर्मध्ये धनधान्यगृहं भवेत् ।
याम्ये मज्जनशाला स्यात् तत्रस्थं पुष्पमण्डपम्[139] ॥ ८४ ॥
नैर्ऋतिस्थानमाश्रित्य कुर्यादायुधमण्डपम् ।
वरुणे वायुदेशे तु शयनस्थानमिष्यते ॥ ८५ ॥

129. E : स्वव्यासार्धं
130. D : कम्प-
131. G : कर्तव्यं
132. E : तथाप्युक्तम्
133. D : प्रासादस्य प्रमाणतः
134. C : तन्त्रित्या
135. D : त्रिशिखात्रयम्; E : त्रितलायतम्
136. E : गोपुरे
137. All the texts (with correction of E): मध्यादि-
138. C : भव्यकोष्ठकम्
139. D : पुष्पमण्डलम्

79-80a Above this is a lotus with a diameter half or three quarters the width (of the altar) and, also above, in the centre (of the lotus), is its receptacle whose width is three quarters that of the lotus; the height of the lotus is three quarters (its width) or is half the height of the receptacle.

80b-81 The altar may or may not have a median projection; it may be on a socle.[43] According to the specific case it may be shaped as one or other of the bases. Such are the features of altars as they have been given by the greatest sages of old.

The flag mast[44]

82-83a In front of Vṛṣabha, half way from the temple, is the place for the flag mast with the trident in front of it; all (three), beginning with Vṛṣa, are inside (the enclosure) and to the left, on the way from gateway (to temple).[45]

Buildings within the enclosures[46]

83b-84 The building for oblations is built against the wall of the *maryādi* enclosure in the south-east corner, with the treasury between this corner and the (eastern) gateway, whilst the pavilion for ablutions is on Yama's square (in the south) where too is the pavilion for flowers.[47]

85 The pavilion for the gods' weapons should be close to the south-west corner whilst the dormitories are to be at the squares of Varuṇa and Vāyu.[48]

43. *Sopapīṭham*: see chapter 13 note 2.
44. Cf. Dagens 1984 p.141.
45. The *triśūla* is more commonly found in front of North Indian Śiva's temples than in South India, where it is often placed in front of Bhairava's shrines however.
46. Cf. Dagens 1984 pp. 138 sq. (about *Ajita* 38.43 sq.).
47. *Maryādi* is the fourth enclosure (above note 5). *Havyakoṣṭha* is the place for preparation of cooked oblations, hence the name of *pacanasthāna* ('kitchen') given by *Ajita*; according to that text it is a *catuśśala*, that is to say a four main building house (see below chapters 26 and 27). The *majjanaśālā* (above v. 73 *snānamaṇḍapa*) may be a *padmaka* or *bhadraka* type pavilion (cf. 25.61-64 and 66-69).
48. The *āyudhamaṇḍapa* ('armoury', cf. *Ajita*: *śastraśālā*) is the place where all the god's paraphernalia are stored; dormitories (*śayanasthāna*) shelter. the processional images (*utsavamūrti*), but, according to *Raurava* (Kriyā. 31.3), they may be used as shrine for Gaurī as well.

सौम्यायां तु प्रकर्तव्यं धर्मश्रवणमण्डपम् ।
[140]ईशे वापी च कूपं स्यादापवत्सपदाश्रितम् ॥ ८६ ॥
ईशगोपुरयोर्मध्ये [141]वाद्यस्थानं प्रकीर्तितम् ।
आरादीशे विमानस्य स्थानं चण्डेश्वरस्य वा ॥ ८७ ॥
पूर्वोक्तस्थानदेशे वा कर्तव्यं भवनं बुधैः[142] ।

[शक्तिस्तम्भः]

शक्तिस्तम्भं[143] पीठात् पुरतो विद्याद् विमानमानेन ॥ ८८ ॥
क्षुद्राणां द्विगुणोदयमल्पानां तत्समं विद्यात् ।
मध्यविमानानामपि तुङ्गार्धं वा त्रिपादोच्चम् ॥ ८९ ॥
[144]उदयत्रिभागमुदितं वाऽर्धं वोत्कृष्टहर्म्याणाम् ।
हस्तं षोडशमात्रं द्वादशदशमात्रकं विपुलम् ॥ ९० ॥
मण्डीकुम्भयुतं[145] तत् फलकोऽर्ध्वे भूतमुक्षा वा[146]
[147]शैलं दारुमयं वा वृत्तं वाष्टाश्रकं द्विरष्टाश्रम् ॥ ९१ ॥

[इतरस्थानानि]

वेशस्थानं वापी कूपारामौ च दीर्घिका चैव ।
सर्वत्र सम्मतं [148]स्यान्मठभुक्तिनिकेतनं चापि ॥ ९२ ॥
नान्तर्मण्डलमथ [149]वा चान्तहारं तथैकसालं चेत् ।
अन्तर्हारा मध्यमहारा [150]मर्यादाभित्तिश्च ॥ ९३ ॥
त्रिप्राकारेऽप्युदिताः पञ्चयुताः पञ्चसालाः[151] स्युः ।
एषां प्राकाराणामुपरि वृषाः स्युः सपङ्क्तिकाः परितः ॥ ९४ ॥

140. E : ऐशान्यादपि कूपः स्याद्
141. D : पाद्यस्थानं
142. G : स्मृतम् instead of बुधैः
143. E : पीठोत्सेधं पुरतो विमान-
144. D : उदयत्रिभागमुपोद्भवोत्कृष्टहर्म्याणाम्
145. E : युगं for युतं
146. E : भूतिमुक्तां वा
147. E : शिलादारुजं
148. E : स्यात् तत्तत्सक्तीनिकेतनं
149. C : वै
150. A, C, D, E, G : मर्यादि-
151. C : पञ्चशालाः

86 The pavilion for religious discourse is at Soma's square, the well at that of Īśa and the tank encompasses that of Āpavatsa.

87-88a The pavilion for musical instrument is between the north-east corner and the (eastern) gateway; the *vimāna* (?)[49] is next to Īśa's square unless it is the shrine of Caṇḍeśvara which is there; but this may otherwise be at the position previously indicated by the sages.

The flag mast (cont.)

88b-91 The flag mast in front of the altar is to be in proportion to the temple; for the very small temples its height is twice theirs, for small ones, equal, for medium ones it is three quarters or half and for big ones a quarter or a half. The pole itself is a cubit wide or is sixteen, twelve or ten digits; it is endowed with bell-capital and abacus and, above the latter, is an image of a dwarf or of a bull; it is in stone or in wood and its section is circular, octagonal or sixteen sided.

Other buildings

92 The house (of the head priest), the well, the tank, the garden and the pond may each be placed in any position as may the *maṭha* and the dining hall.[50]

93-94a If a sanctuary has only one enclosure it is not the *antarmaṇḍala* but the *antarhāra*; if three, they are *antarhāra, madyamahāra* and *maryādabhitti*; if there are five enclosures, the five types described should be used.[51]

49. *Vimāna* is a synonym to *prāsāda* (cf. 19.10-12); it is also defined as a wagon-roof building (26.100); the location given here corresponds roughly to that of the sacrificial pavilion (cf. *Ajita* 38.49a: *aiśānyāṃ diśi kurvīta yāgamaṇḍapam uttamam*); that pavilion is described in chapter 25 (v. 42) but not mentioned here amongst the temple annexes unless it is to be recognized under that name of '*vimāna*'. From another point of view it may be noted that characters for 'pa' and 'va' are very much alike in grantha script and often mistaken one for the other; thus *ārād īśe vimānasya sthānasya sthānam* may be the result of a wrong reading of *ārād īśe'pi yāgasya sthānam*.

50. The *maṭha* is often a school with students' lodging attached to the temple; it may also be used as a *dharmaśālā* for pilgrims or wandering ascetics.

51. That is to say that references to *antarmaṇḍala* are not to be taken in account in the arrangement of the sanctuary when that last comprises all the five enclosures.

शक्तिस्तम्भात् पुरतस्त्रिचतुःपञ्चान्तरालयं नीत्वा ।
गणिकागृहमथ पार्श्वद्वये तु [152]संवाहिकासहितम् ॥ ९५ ॥
[153]प्राकारबहिः परितो वासं [154]परिवारकाणां तु ।
दासीनामपि तद्वत् पुरतो वा वासमुद्दिष्टम् ॥ ९६ ॥
यमदिशि गुरुमठमुदितं पूर्वस्मिन् वाऽप्यवाग्वदनम् ।
शेषमनुक्तं सर्वं कुर्याद् राजोपचारेण ॥ ९७ ॥

[विष्णुपरिवारकम्]

विष्णुधिष्ण्येऽहमद्यापि[155] वक्ष्यामि परिवारकम् ।
[156]प्रमुखे वैनतेयश्च वह्नौ गजमुखालयम् ॥ ९८ ॥
[157]यमे पितामहः सप्त मातरः पितरीरिताः[158] ।
गुह्ये जलेशे [159]वायव्ये दुर्गा सोमे धनाधिपः[160] ॥ ९९ ॥
[161]सेनापतिरथैशाने पीठादीनां तु पूर्ववत् ।
[162]प्राकारोऽप्येक[163] एवं स्यादुच्यन्ते द्वादशाधुना ॥ १०० ॥
विष्णोरभिमुखं चक्रं गरुडस्तत्प्रदक्षिणे ।
शङ्खो वामे [164]बहिर्वक्त्राश्चैते सकलरूपिणः ॥ १०१ ॥
सूर्याचन्द्रमसौ पार्श्वे गोपुरस्यान्तराननौ ।
वह्नौ पचनगेहं स्याच्छेषं पूर्ववदाचरेत् ॥ १०२ ॥
मध्यान्तर्हारयोरेव परिवारास्तु षोडश ।
मण्डपस्याग्रतः कुर्यात् पक्षिराजं तु पीठकम् ॥ १०३ ॥

152. A : साम्बाहिका; C : सांवाहिका; E : साम्पाहिका; G : समहिका
153. E : प्राकाराद्बहिः
154. E : परिचार-
155. E : अत्रापि
156. E : प्राङ्मुखे वैनतेयस्य प्राकारान्तं मुखालयम्
157. D: वामे
158. D : पितरिस्थलं; G : पितरः स्मृताः
159. E : वायव्यां
160. E : धनाधिपे
161. E : सेनापतिरुदग्दर्भपीठादीनां
162. E : प्राकारोऽप्येवमेका स्युर्द्वादशैर्वाधुनोच्यते
163. C : एव for एक
164. B : वह्निवक्त्राश्चैते

94b There are images of bulls along the entire length of the top of the enclosure walls.[52]

95 To the east, and at a distance from the flag mast of the goddess equal to three, four or five times the width of the main temple, are houses of courtesans on both sides of which are places for masseuses.

96-97a All around, outside the enclosures, are the habitations of the servants (of the temple) but these houses may otherwise be to the east; the hermitage of the Master is in the south or in the east but opens to the south.

97b All that which has not been described is to be done at the behest of the prince.

Attendants of Viṣṇu[53]

98-100a The Attendants to be arranged around the Viṣṇu temple are now presented: Vainateya is at the east and the shrine of Gajamukha is at the position of Vahni; Pitāmaha is at Yama's position and the Mothers at that of Pitṛ; Guha is at Jaleśa's, Durgā at Vāyu's and Dhanādhipa at Soma's; lastly, Senāpati is at Īśa's. For altars (etc. . . .) the procedure is as above and it is like this that things are to be done when there is only one enclosure.

100b-102 Directions are now given as to the procedure for twelve Attendants. Cakra is in front of Viṣṇu, Garuḍa a little to the south and Śaṅkha to the north; they face the exterior and are to be represented in manifest images.[54] Sūrya and Candramas are on each side of the gateway facing the interior; the oblations pavilion is at the position of Vahni and the rest is as above.

103-105a When there are sixteen Attendants they are installed in the *antarhāra* and in the *madyahāra*; Pakṣirāja and the altar are in front of the main temple's pavilion; the Lords of the cardinal points are to be each in his place with the exception of Śiva.[55] Installed as well are Āditya, Bhṛgu,

52. Cf. above v. 21.

53. About Viṣṇu's Attendants, see *Marīcisaṃhitā*, chapter 12 (Colas 1986 pp. 144 sq.), *Kāśyapajñānakāṇḍa* chapter 39 (Goudriaan 1965 p. 126), *Mānasāra* 32.120 sq.

54. *Sakala*: above note 16. About manifest images of Cakra and Śaṅkha, cf. J.N. Banerjea, *Development of Hindu Iconography*, 2nd. edn., Calcutta 1956, p. 539.

55. *Śivaṃ vinā*: Śiva which is the north-east *dikpāla* under the name of Īśāna, is to be installed at that direction according to the texts quoted above (note 53).

लोकेशाः क्रमशः स्थाप्यास्तत्तदंशे शिवं विना[165] ।
आदित्यश्च भृगुश्चैवमश्विनौ[166] च सरस्वती ॥ १०४ ॥
पद्मा च पृथिवी चैव मुनयः सचिवस्तथा[167] ।
द्वारपालकमध्यादिष्वन्तराले तु कीर्तिताः ॥ १०५ ॥
द्वात्रिंशत्परिवारांश्च युक्त्या तत्रैव योजयेत्[168] ॥ १०५½ ॥

चण्डप्रचण्डरथ[169] नेमिसपाञ्चजन्य-
दुर्गागणेशरविचन्द्रमहानुभावाः ।
[170]सर्वेश्वरः सुरपतिश्च तथा दशैते
[171]प्राकारपञ्चमुखगोपुरकल्पनीयाः ॥ १०६½ ॥

[वृषलक्षणम्]

[172]वृषस्य लक्षणं सम्यक् संक्षिप्येह प्रवक्ष्यते ॥ १०७ ॥
[173]द्वारलिङ्गसमं श्रेष्ठं [174]चतुरंशविहीनकम् ।
मध्यमं त्रिद्विभागोच्चं कन्यसं वृषभोदयम् ॥ १०८ ॥
गर्भार्धं कन्यसं [175]नालीगेहतुल्यं वरोदयम् ।
तदन्तरेऽष्टभागे तु नवमानमुदीरितम् ॥ १०९ ॥
एकादिनवहस्तान्तं कनिष्ठादित्रयं त्रयम् ।
[176]पञ्चाशदंशकं [177]तुङ्गमेकांशमात्रमीरितम् ॥ ११० ॥
पञ्चाष्टाङ्गुलमायामं [178]तन्मानमधुनोच्यते ।
मूर्ध्नस्तु गलपर्यन्तं दशमात्रं ततस्त्वधः ॥ १११ ॥

165. E : तत्तदङ्गे शिवा विना
166. C, D : अश्विनी
167. D : मुनयः सविवस्वता; E : मुनीनां सचिवो भृगुः
168. E : तत्र प्रयोजयेत्
169. E : नेमिषु instead of नेमिस-
170. E : सर्पेश्वरः
171. D : प्रासाद-
172. D : वृषस्यालयं
173. D : द्वारं लिङ्गसमं; E : द्वारोत्सेधसमं
174. D : चतुरंशकहीनकम्
175. E : नालं गर्भं तुल्यं
176. D : पञ्चदशकरं
177. F : तुङ्गमेकदशमात्रमीरितम्
178. D : नाम्ना-

the two Aśvin, Sarasvatī, Padmā, Pṛthivī as well as the Sages and Saciva:[56] all these deities must be in the space between the (corners) and the *dvārapāla* who are in the middle.

105 1/2 When there are thirty-two Attendants they are to be arranged according to the specific circumstance.

106 Caṇḍa, Pracaṇḍa, Rathanemi, and Pāñcajanya, Durgā, Gaṇeśa, Ravi, Candra: these great gods, as well as Sarveśvara and Surapati[57] are, all ten to be installed on the facades of the gateways of the five enclosures.

Characteristics of (the image of) Vṛṣa.[58]

107-110a The characteristics of the image of Vṛṣa are now briefly described. When the image is large-sized, its height is equal to that of the door or to that of the Liṅga; when it is of medium size then it is three quarters that height and, if it is small, two thirds. (Or else), the small sized image will be equal to half the height of the sanctum and the large size one equal to the total of that height. The difference between these two dimensions divided into eight parts yields nine possible heights, or else, from one cubit to nine there are three heights for each category beginning with the small images.

110b-113a The digit[59] is equal to a fiftieth part of the image's height. The length is forty digits and these are the proportions: (from the top) of the head to the top of the neck there are ten digits; the height of the neck is eight digits and there are sixteen digits (from the neck) to the top of the rear

56. Padmā is Śrī. Saciva ('minister') is probably Bṛhaspati.

57. Sarveśvara is Camuṇḍa (Colas 1986 p.149). Manuscript E of Mayamata contains instead the reading *sarpeśvaraḥ*, thus referring to Ananta.

58. Cf. *Ajita* 36.363-375 and texts quoted in Pandit N.R. Bhatt's edition, vol. 2, pp. 63-65.

59. *Mātra, aṅgula*: in this passage those terms designate the iconometric relative unit which is to be called properly 'digit taken from the body (of the god)' (*dehalabdhāṅgula*, cf 5.11b-12 and Dagens 1984 p. 16-17).

ग्रीवोच्चमष्टमात्रं [179]स्यादुरोन्तं षोडशाङ्गुलम्।
ऊरुदैर्घ्यं च षण्मात्रं [180]जानुमानं द्विमात्रकम्॥ ११२ ॥
[181]जङ्घादीर्घं षडङ्गुल्या खुरं कोलकमुच्यते।
शृङ्गान्तरं द्विमात्रं स्याच्छृङ्गदैर्घ्यं द्विकोलकम्[182] ॥ ११३ ॥
[183]मूलव्यासं त्रिभागेन शृङ्गाग्रं तु द्विमात्रकम्।
ललाटं नवमात्रं स्यान्मुखव्यासं शराङ्गुलम्॥ ११४ ॥
उत्सेधं तत्समं नेत्रायामं द्व्यङ्गुलमीरितम्।
सार्धाङ्गुलं तदुत्सेधं नेत्रमध्यान्मुखायतम्॥ ११५ ॥
वसुमात्रं ततः [184]पृष्ठं ग्रीवान्तं तु षडङ्गुलम्।
नेत्रमध्याल्ललाटोच्चं चतुर्मात्रं प्रकीर्तितम्[185] ॥ ११६ ॥
नेत्रात् [186]कर्णान्तरं तावत् [187]कर्णायामं शराङ्गुलम्।
कर्णमूलं द्विमात्रं स्याद् भागं कर्णस्य मध्यमम्॥ ११७ ॥
अग्रमङ्गुलविस्तारं घनमर्धाङ्गुलं भवेत्।
[188]घ्राणं [189]सार्धाङ्गुलायाममङ्गुलं गाढविस्तृतम्॥ ११८ ॥
[190]अङ्गुलं नासिकातुङ्गमास्यं पञ्चाङ्गुलायतम्।
[191]उत्तरोष्ठं त्रिमात्रोच्चमधरोष्ठं द्विमात्रकम्॥ ११९ ॥
जिह्वायामविशालोच्चं त्रिद्व्येकाङ्गुलमीरितम्।
ग्रीवाव्यासं दशाङ्गुल्या मूलं द्वादशमात्रकम्॥ १२० ॥

179. D : स्यादधरान्तं; E : स्याद् भुजान्तं
180. All the texts, excepted B : जानुमात्रं
181. D : जङ्घादिकं षडङ्गुल्यं; D, G : जङ्घा षडङ्गलं दैर्घ्यं
182. G : त्रिकोलकम्
183. E : उरुव्यासं तु भागोनं; F : मूलव्यासं द्विभागेन शृङ्गस्याग्रं तु कोलकम्
184. D : पृष्ठा ग्रीवाग्रं
185. F : प्रशस्यते
186. D : कण्ठा-
187. D : कण्ठा-
188. G : omits 118b-119a
189. F : सार्धाङ्गुलं स्यादङ्गुलं
190. E : अङ्गुलं नासिकादूर्ध्वमास्यं त्रिमात्रकं भवेत्
191. E : omits 119b.

thigh; this is six digits long and the dimension of the knee is two digits; the foot is six digits long and it is said that the hoof is two double digits.[60]

113b-116 The space between the horns is two digits whilst their own length is two double digits; their diameter at the bottom is three digits and, at the top, two. The frontal is nine digits, the width and height of the muzzle is five digits; the eyes are two digits long and one and a half wide; the distance between muzzle and eyeline is eight digits, from nape to the neck itself, six digits and the height of the frontal from the eyeline is half a digit.

117-118a The distance between eyes and ears is equal to the length of the ears, that is, five digits; at the bottom, the ears are two digits wide, in the middle two digits wide, as at the top; their thickness is half a digit.

118b-119 The muzzle is a digit and a half long and the open part is a digit high and the mouth five digits long; the upper lip is three digits high and the lower two.

120a The tongue is three digits long, two wide and one thick.

120b-121a The diameter of the neck is ten digits but is twelve at its lower part; at the nape, the thickness of the neck is eight digits at the withers and six at the bottom of the head.

60. *Kolaka* = 'two digits'; cf. *Ajita* 36.38b-39 :

अङ्गुलं मात्रमंशश्च शब्दाः पर्यायवाचकाः ।
द्व्यङ्गुलं कोलकं ज्ञेयं त्र्यङ्गुलं तु कला भवेत् ॥
भागं स्याच्चतुरङ्गुल्यं यावकं तद्द्वयं भवेत् ।

[192]मूलेऽग्रे च घनं [193]पृष्ठे ग्रीवस्याष्टषडङ्गुलम् ।
[194]ककुत् षडङ्गुलव्यासमुत्सेधं तु तदर्धकम्[195] ॥ १२१ ॥
ग्रीवस्याग्रविशालं तु [196]द्विमात्रं युक्ततो न्यसेत् ।
[197]ककुदस्तु शरीरोच्चं त्रिःषडङ्गुलमीरितम्[198] ॥ १२२ ॥
द्विःसप्तमात्रकं [199]पृष्ठे व्यासं द्वादशमात्रकम् ।
[200]अपरोरुविशालं तु दशाष्टचतुरङ्गुलम् ॥ १२३ ॥
[201]पञ्चाङ्गुलं [202]तदायामं जानुदेशं द्विमात्रकम् ।
[203]जङ्घादैर्घ्यं शराङ्गुल्या त्र्यङ्गुलं स्याद् विशालकम्[204] ॥ १२४ ॥
सुरोत्सेधं त्रिमात्रं स्यात् पुच्छमूलं तथैव च ।
सार्धाङ्गुलं तु पुच्छाग्रं जङ्घान्तं तस्य लम्बनम् ॥ १२५ ॥
मुष्कायामविशालं तु [205]त्रिद्विमात्रं यथाक्रमम् ।
[206]शेफायामं [207]त्रिमात्रं स्यादुदरादङ्गुलं घनम् ॥ १२६ ॥
ऊरुमूलविशालं तु चतुरङ्गुलमग्रतः ।
[208]जङ्घाग्रे तु [209]द्विमात्रं स्याच्छेषं युक्तिवशान्नयेत् ॥ १२७ ॥
स्थितं वा शयितं वाऽपि यथा योग्यं तथाचरेत् ।
[210]सुधालोहैः [211]परैर्द्रव्यैर्यथा योग्यं तथा चरेत् ॥ १२८ ॥

192. D : मूलग्रीवघनं दिष्टं
193. G : पृष्ठं
194. G : ककुन्मूलं षड्न्यासमुत्सेधं चतुरङ्गुलम्
195. D : तदुत्तमे
196. D : त्रिमात्रं तु त्रिको न्यसेत्
197. D : कृकस्तु
198. D : विस्तृतम्
199. D : व्यासमुरु- instead of पृष्ठे व्यासं
200. E : अपरोग्रविशलं
201. G : omits verses 124-125.
202. D : तलायमं
203. E : जङ्घापञ्चाङ्गुलं दैर्घ्यं
204. D : स्याद् द्विमात्रकम्
205. G : द्वित्रिमात्रके
206. E : शोभायामं
207. G : त्रिपादं
208. E : जङ्घयोस
209. D : त्रिमात्रं
210. End of chapter is missing in F and G; E : omits 128b-129.
211. A (var), C : फलैर्

121b-122a The hump is six digits wide, its height half its width and it is two digits at the withers.

122b-123a The height of the flanks at the level of the hump is eighteen digits; that of the spine is fourteen; the width of the body is twelve digits.

123b-125a The width of the hind thighs is ten, eight and then four digits; their length is five digits and the knee is two; the hind feet are five digits long and three wide; the height of the hooves is three digits.

125b At its start, the tail has a diameter of three digits and at its end, one and a half; it hangs down to the foot.

126. The testicles are three digits long and two wide; the length of the penis is three digits and its diameter at the beginning is one digit.

127a The space between the thighs is four digits high and that between the hocks two.

127b-129a The remainder may be determined relative to the specific circumstance; the image may be standing or stretched out, depending upon which is most convenient and, also in relation to circumstance, it may be made in stucco, metal or other materials; if in metal, it may be hollow or solid.[61]

61. According to *Kāraṇāgama* (I.60.76) only metal images of Vṛṣa may be standing :

लोहेनोक्षं प्रकर्तव्यं स्थितं वा शयनं तु वा ।
शैलेन मृण्मयेनैव शयनं चैव कारयेत् ॥

घनं वाऽप्यघनं वाऽपि लोहजं युक्तितो नयेत् ।
सकलस्य तु यन्मानं तन्मानं वृषभोदयम् ॥ १२९ ॥
किञ्चिन्न्यूनाधिकं कार्यं सर्वदोषसमुद्भवम् ।
तस्मात् परिहरेद् [212]विद्वान् सर्वलक्षणसंयुतम् ॥ १३० ॥

द्वारलिङ्गसमं वृषभं वरं
मध्यमं चतुरंशविहीनकम् ।
द्वित्रिभागसमोदयमीरितं
[213]कन्यसं त्रिविधं मुनिभिर्वरैः ॥ १३१ ॥

इति मयमते वस्तुशास्त्रे [214]प्राकारपरिवारविधानो नाम
त्रयोविंशोऽध्यायः

212. D : सर्वान्
213. E : कन्यसं वृषभं मृनिभिर्वरैः
214. A, B : सन्धिकर्मविधानो; D : प्रासादपरिवारविधानो

129b-130 Vṛṣa's height is to be in proportion to the height of the manifest image (of Śiva); even the smallest increase or diminution causes sorrow without end and this is why the prudent man endows this image with all characteristics prescribed.

131 According to the best of sages, Vṛṣa may have one of three heights: the largest is equal to that of the door or to that of the Liṅga, the medium is three quarters that and the smallest two thirds.

Thus ends, in the *Mayamata*, treatise on dwelling,
the twenty-third chapter : RULES FOR THE
ENCLOSURES AND FOR THE
ATTENDANTS' SHRINES.

Dr. Bruno Dagens (b. 1935) is an eminent Sanskritist and archaeologist. He is a member of the École Français d'Extrême-Orient. Dr. Dagens taught Sanskrit at the University of Louvain (Belgium) and did archaeological research in Afghanistan and Cambodia. He also worked, since 1977, at the Institut Français d'Indologie, Pondicherry for quite a few years.

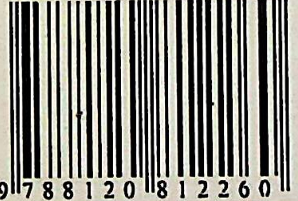
Besides articles and research papers on the Archaeology and Iconography of monuments in Afghanistan and Cambodia, two earlier editions of the *Mayamata* and one edition of the *Śaivāgamaparibhāṣāmañjarī* (a compendium of Śaiva doctrines and rituals), Dr. Dagens has authored *Architecture in the Ajitāgama and the Rauravāgama* (Sitaram Bharatia Institute of Scientific Research, New Delhi 1984).

"The *Mayamatam* is an important treatise on *Vāstusāstram* dealing exhaustively with the construction of temples and human dwellings—from the choice of the site, iconography of temples etc. It is intended as a manual for the architect and a guide book for the lay man."

K. Kunjunni Raja,
Adyar Library Bulletin-95

"The work under review has a total of 36 chapters with Sanskrit definitions and easily understandable English translation, aided by relevant footnotes at various places. The example diagrams (36 in all) given for relevant topics ease the reader's mind and bestow upon him clear material for study of the principles enunciated in the original. Every minute detail, needless to stress, has been well-attended in the various chapters."

R. Santhanam,
The Times of Astrology, Dec.-95


ISBN 978-81-208-1226-0
9 788120 812260